

December 22, 2017

Appendix D **VEGETATION AND WETLANDS, AND
WILDLIFE AND WILDLIFE HABITAT
ENVIRONMENT SURVEY DATA**

ENVIRONMENTAL IMPACT ASSESSMENT (EIA) REGISTRATION FOR THE MODERNIZATION OF ELECTRICAL TRANSMISSION INFRASTRUCTURE NEAR NEGUAC, NEW BRUNSWICK

December 22, 2017

DATA REPORT 5888: Neguac, NB

Prepared 14 July 2017

by J. Churchill, Data Manager

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1.0 PREFACE

The Atlantic Canada Conservation Data Centre (ACCDC) is part of a network of NatureServe data centres and heritage programs serving 50 states in the U.S.A, 10 provinces and 1 territory in Canada, plus several Central and South American countries. The NatureServe network is more than 30 years old and shares a common conservation data methodology. The ACCDC was founded in 1997, and maintains data for the jurisdictions of New Brunswick, Nova Scotia, Prince Edward Island, and Newfoundland and Labrador. Although a non-governmental agency, the ACCDC is supported by 6 federal agencies and 4 provincial governments, as well as through outside grants and data processing fees. URL: www.ACCDC.com.

Upon request and for a fee, the ACCDC queries its database and produces customized reports of the rare and endangered flora and fauna known to occur in or near a specified study area. As a supplement to that data, the ACCDC includes locations of managed areas with some level of protection, and known sites of ecological interest or sensitivity.

1.1 DATA LIST

Included datasets:

Filename	Contents
NeguacNB_5888ob.xls	All Rare and legally protected <i>Flora and Fauna</i> in your study area
NeguacNB_5888ob100km.xls	A list of Rare and legally protected <i>Flora and Fauna</i> within 100 km of your study area
NeguacNB_5888ma.xls	All <i>Managed Areas</i> in your study area
NeguacNB_5888sa.xls	All <i>Significant Natural Areas</i> in your study area
NeguacNB_5888ff.xls	Rare and common <i>Freshwater Fish</i> in your study area (DFO database)
NeguacNB_5888bc.xls	Rare and common <i>Colonial Birds</i> in your study area
NeguacNB_5888bb.xls	Common <i>Breeding Birds</i> in your study area

1.2 RESTRICTIONS

The ACCDC makes a strong effort to verify the accuracy of all the data that it manages, but it shall not be held responsible for any inaccuracies in data that it provides. By accepting ACCDC data, recipients assent to the following limits of use:

- a) Data is restricted to use by trained personnel who are sensitive to landowner interests and to potential threats to rare and/or endangered flora and fauna posed by the information provided.
- b) Data is restricted to use by the specified Data User; any third party requiring data must make its own data request.
- c) The ACCDC requires Data Users to cease using and delete data 12 months after receipt, and to make a new request for updated data if necessary at that time.
- d) ACCDC data responses are restricted to the data in our Data System at the time of the data request.
- e) Each record has an estimate of locational uncertainty, which must be referenced in order to understand the record's relevance to a particular location. Please see attached Data Dictionary for details.
- f) ACCDC data responses are not to be construed as exhaustive inventories of taxa in an area.
- g) The absence of a taxon cannot be inferred by its absence in an ACCDC data response.

1.3 ADDITIONAL INFORMATION

The attached file DataDictionary 2.1.pdf provides metadata for the data provided.

Please direct any additional questions about ACCDC data to the following individuals:

Plants, Lichens, Ranking Methods, All other Inquiries

Sean Blaney, Senior Scientist, Executive Director

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Questions on the biology of Federal Species at Risk can be directed to ACCDC: (506) 364-2658, with questions on Species at Risk regulations to: Samara Eaton, Canadian Wildlife Service (NB and PE): (506) 364-5060 or Julie McKnight, Canadian Wildlife Service (NS): (902) 426-4196.

For provincial information about rare taxa and protected areas, or information about game animals, deer yards, old growth forests, archeological sites, fish habitat etc., in New Brunswick, please contact Stewart Lusk, Natural Resources: (506) 453-7110.

For provincial information about rare taxa and protected areas, or information about game animals, deer yards, old growth forests, archeological sites, fish habitat etc., in Nova Scotia, please contact Sherman Boates, NSDNR: (902) 679-6146. To determine if location-sensitive species (section 4.3) occur near your study site please contact a NSDNR Regional Biologist:

Western: Duncan Bayne

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For provincial information about rare taxa and protected areas, or information about game animals, fish habitat etc., in Prince Edward Island, please contact Garry Gregory, PEI Dept. of Communities, Land and Environment: (902) 569-7595.

2.0 RARE AND ENDANGERED SPECIES

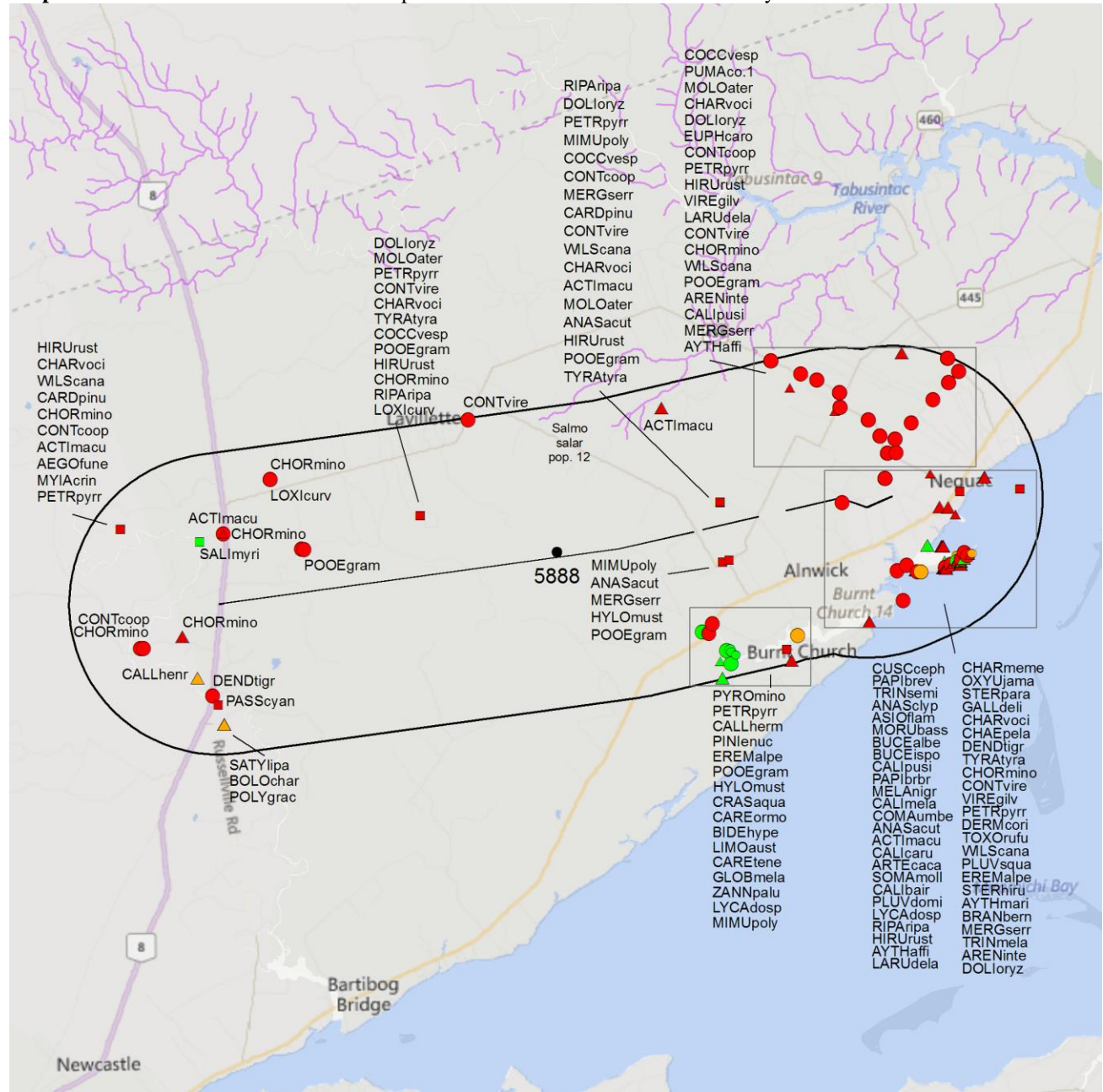
2.1 FLORA

The study area contains 17 records of 12 vascular, no records of nonvascular flora (Map 2 and attached: *ob.xls).

2.2 FAUNA

The study area contains 415 records of 58 vertebrate, 15 records of 7 invertebrate fauna (Map 2 and attached data files - see 1.1 Data List). Please see section 4.3 to determine if 'location-sensitive' species occur near your study site.

Map 2: Known observations of rare and/or protected flora and fauna within the study area.



RESOLUTION

- 4.7 within 50s of kilometers
- 4.0 within 10s of kilometers
- 3.7 within 5s of kilometers
- △ 3.0 within kilometers
- △ 2.7 within 500s of meters
- ◇ 2.0 within 100s of meters
- ◇ 1.7 within 10s of meters

HIGHER TAXON

- vertebrate fauna
- invertebrate fauna
- vascular flora
- nonvascular flora

3.0 SPECIAL AREAS

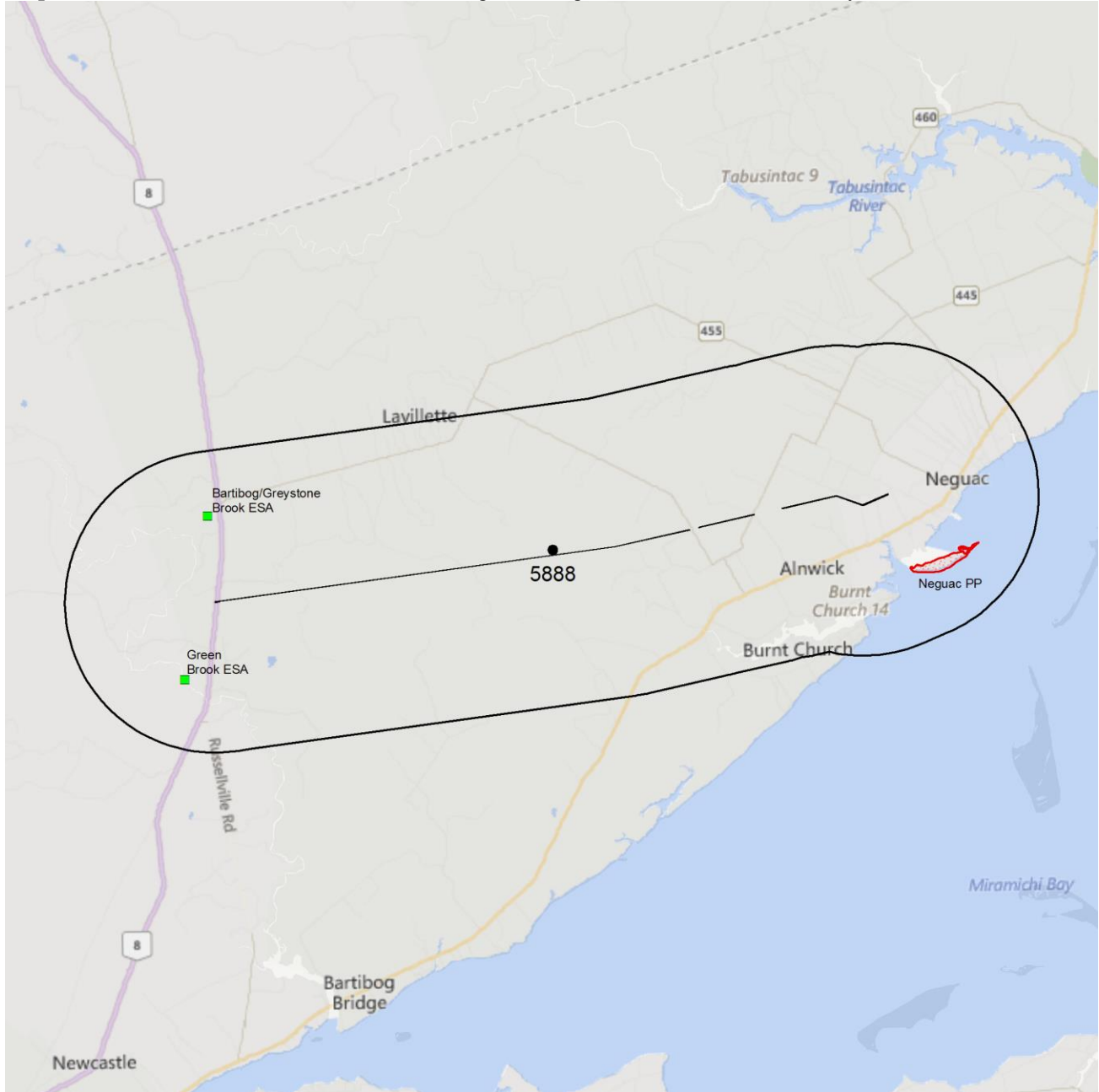
3.1 MANAGED AREAS

The GIS scan identified 1 managed area in the vicinity of the study area (Map 3 and attached file: *ma*.xls)






3.2 SIGNIFICANT AREAS

The GIS scan identified 2 biologically significant sites in the vicinity of the study area (Map 3 and attached file: *sa*.xls)

Map 3: Boundaries and/or locations of known Managed and Significant Areas within the study area.



MANAGED AREAS SIGNIFIIGANT AREAS

- | | |
|---|--|
|  boundary |  boundary |
|  approximate |  approximate |
| |  point location |

4.0 RARE SPECIES LISTS

Rare and/or endangered taxa (excluding “location-sensitive” species, section 4.3) within the study area listed in order of concern, beginning with legally listed taxa, with the number of observations per taxon and the distance in kilometers from study area centroid to the closest observation (\pm the precision, in km, of the record). [P] = vascular plant, [N] = nonvascular plant, [A] = vertebrate animal, [I] = invertebrate animal, [C] = community. Note: records are from attached files *ob.xls/*ob.shp only.

4.1 FLORA

	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)
P	<i>Cuscuta cephalanthi</i>	Buttonbush Dodder				S1S3	2 May Be At Risk	4	12.4 \pm 1.0
P	<i>Salix myricoides</i>	Bayberry Willow				S2?	3 Sensitive	1	11.9 \pm 5.0
P	<i>Callitriche hermaphroditica</i>	Northern Water-starwort				S2S3	4 Secure	1	6.6 \pm 0.0
P	<i>Artemisia campestris ssp. caudata</i>	Field Wormwood				S3	4 Secure	1	13.5 \pm 0.0
P	<i>Bidens hyperborea</i>	Estuary Beggarticks				S3	4 Secure	1	6.5 \pm 0.0
P	<i>Crassula aquatica</i>	Water Pygmyweed				S3	4 Secure	1	6.9 \pm 0.0
P	<i>Pyrola minor</i>	Lesser Pyrola				S3	4 Secure	1	5.5 \pm 0.0
P	<i>Comandra umbellata</i>	Bastard's Toadflax				S3	4 Secure	2	13.3 \pm 0.0
P	<i>Limosella australis</i>	Southern Mudwort				S3	4 Secure	1	6.9 \pm 0.0
P	<i>Carex ormostachya</i>	Necklace Spike Sedge				S3	4 Secure	1	6.9 \pm 1.0
P	<i>Carex tenera</i>	Tender Sedge				S3	4 Secure	1	6.6 \pm 0.0
P	<i>Zannichellia palustris</i>	Horned Pondweed				S3	4 Secure	2	6.7 \pm 0.0

4.2 FAUNA

	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)
A	<i>Charadrius melodus melodus</i>	Piping Plover melodus ssp	Endangered	Endangered	Endangered	S1B,S1M	1 At Risk	5	15.6 \pm 7.0
A	<i>Dermochelys coriacea (Atlantic pop.)</i>	Leatherback Sea Turtle - Atlantic pop.	Endangered	Endangered	Endangered	S1S2N	1 At Risk	1	13.1 \pm 1.0
A	<i>Calidris canutus rufa</i>	Red Knot rufa ssp	Endangered		Endangered	S2M	1 At Risk	1	13.2 \pm 2.0
A	<i>Hylocichla mustelina</i>	Wood Thrush	Threatened		Threatened	S1S2B,S1S2M	2 May Be At Risk	2	5.5 \pm 7.0
A	<i>Hirundo rustica</i>	Barn Swallow	Threatened		Threatened	S2B,S2M	3 Sensitive	22	10.7 \pm 0.0
A	<i>Chaetura pelagica</i>	Chimney Swift	Threatened	Threatened	Threatened	S2S3B,S2M	1 At Risk	1	15.6 \pm 7.0
A	<i>Riparia riparia</i>	Bank Swallow	Threatened		Threatened	S2S3B,S2S3M	3 Sensitive	14	11.2 \pm 0.0
A	<i>Contopus cooperi</i>	Olive-sided Flycatcher	Threatened	Threatened	Threatened	S3B,S3M	1 At Risk	4	14.2 \pm 0.0
A	<i>Wilsonia canadensis</i>	Canada Warbler	Threatened	Threatened	Threatened	S3B,S3M	1 At Risk	8	11.9 \pm 0.0
A	<i>Dolichonyx oryzivorus</i>	Bobolink	Threatened		Threatened	S3B,S3M	3 Sensitive	31	10.4 \pm 0.0
A	<i>Chordeiles minor</i>	Common Nighthawk	Threatened	Threatened	Threatened	S3B,S4M	1 At Risk	9	11.1 \pm 0.0
A	<i>Asio flammeus</i>	Short-eared Owl	Special Concern	Special Concern	Special Concern	S2B,S2M	3 Sensitive	1	11.7 \pm 0.0
A	<i>Bucephala islandica (Eastern pop.)</i>	Barrow's Goldeneye - Eastern pop.	Special Concern	Special Concern	Special Concern	S2M,S2N	3 Sensitive	4	12.0 \pm 0.0
A	<i>Euphagus carolinus</i>	Rusty Blackbird	Special Concern	Special Concern	Special Concern	S3B,S3M	2 May Be At Risk	1	10.8 \pm 0.0
A	<i>Coccothraustes vespertinus</i>	Evening Grosbeak	Special Concern			S3B,S3S4N,SUM	3 Sensitive	10	10.4 \pm 0.0
A	<i>Contopus virens</i>	Eastern Wood-Pewee	Special Concern		Special Concern	S4B,S4M	4 Secure	12	10.4 \pm 0.0
A	<i>Aegolius funereus</i>	Boreal Owl	Not At Risk			S1S2B,SUM	2 May Be At Risk	1	14.6 \pm 7.0
A	<i>Globicephala melas</i>	Long-finned Pilot Whale	Not At Risk			S2S3		1	8.6 \pm 1.0
A	<i>Sterna hirundo</i>	Common Tern	Not At Risk			S3B,SUM	3 Sensitive	20	12.8 \pm 1.0
A	<i>Puma concolor pop. 1</i>	Eastern Cougar	Data Deficient		Endangered	SU	5 Undetermined	1	13.3 \pm 1.0
A	<i>Tringa melanoleuca</i>	Greater Yellowlegs				S1?B,S5M	4 Secure	9	12.8 \pm 1.0
A	<i>Oxyura jamaicensis</i>	Ruddy Duck				S1B,S2S3M	4 Secure	1	11.2 \pm 0.0
A	<i>Aythya affinis</i>	Lesser Scaup				S1B,S4M	4 Secure	7	10.7 \pm 1.0
A	<i>Aythya marila</i>	Greater Scaup				S1B,S4M,S2N	4 Secure	1	12.9 \pm 1.0
A	<i>Eremophila alpestris</i>	Horned Lark				S1B,S4N,S5M	2 May Be At Risk	7	12.8 \pm 1.0
A	<i>Sterna paradisaea</i>	Arctic Tern				S1B,SUM	2 May Be At Risk	3	12.0 \pm 1.0
A	<i>Branta bernicla</i>	Brant				S1N, S2S3M	4 Secure	1	12.9 \pm 1.0
A	<i>Calidris bairdii</i>	Baird's Sandpiper				S1S2M	3 Sensitive	1	13.0 \pm 0.0
A	<i>Mimus polyglottos</i>	Northern Mockingbird				S2B,S2M	3 Sensitive	4	5.7 \pm 0.0

	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)
A	<i>Toxostoma rufum</i>	Brown Thrasher				S2B,S2M	3 Sensitive	2	12.8 ± 1.0
A	<i>Pooecetes gramineus</i>	Vesper Sparrow				S2B,S2M	2 May Be At Risk	7	12.7 ± 0.0
A	<i>Pinicola enucleator</i>	Pine Grosbeak				S2B,S4S5N,S4S5M	3 Sensitive	2	8.3 ± 7.0
A	<i>Anas clypeata</i>	Northern Shoveler				S2S3B,S2S3M	4 Secure	3	11.4 ± 0.0
A	<i>Myiarchus crinitus</i>	Great Crested Flycatcher				S2S3B,S2S3M	3 Sensitive	1	14.6 ± 7.0
A	<i>Petrochelidon pyrrhonota</i>	Cliff Swallow				S2S3B,S2S3M	3 Sensitive	17	10.1 ± 0.0
A	<i>Pluvialis dominica</i>	American Golden-Plover				S2S3M	3 Sensitive	1	13.0 ± 0.0
A	<i>Loxia curvirostra</i>	Red Crossbill				S3	4 Secure	3	4.7 ± 7.0
A	<i>Carduelis pinus</i>	Pine Siskin				S3	4 Secure	4	14.6 ± 7.0
A	<i>Charadrius vociferus</i>	Killdeer				S3B,S3M	3 Sensitive	22	10.6 ± 0.0
A	<i>Tringa semipalmata</i>	Willet				S3B,S3M	3 Sensitive	27	12.0 ± 0.0
A	<i>Vireo gilvus</i>	Warbling Vireo				S3B,S3M	4 Secure	4	11.3 ± 0.0
A	<i>Passerina cyanea</i>	Indigo Bunting				S3B,S3M	4 Secure	1	12.4 ± 7.0
A	<i>Molothrus ater</i>	Brown-headed Cowbird				S3B,S3M	2 May Be At Risk	6	14.5 ± 0.0
A	<i>Somateria mollissima</i>	Common Eider				S3B,S4M,S3N	4 Secure	1	13.5 ± 1.0
A	<i>Dendroica tigrina</i>	Cape May Warbler				S3B,S4S5M	4 Secure	3	12.4 ± 0.0
A	<i>Anas acuta</i>	Northern Pintail				S3B,S5M	3 Sensitive	17	13.3 ± 0.0
A	<i>Mergus serrator</i>	Red-breasted Merganser				S3B,S5M,S4S5N	4 Secure	13	12.9 ± 1.0
A	<i>Arenaria interpres</i>	Ruddy Turnstone				S3M	4 Secure	8	12.8 ± 1.0
A	<i>Melanitta nigra</i>	Black Scoter				S3M,S1S2N	3 Sensitive	8	13.2 ± 0.0
A	<i>Bucephala albeola</i>	Bufflehead				S3M,S2N	3 Sensitive	4	12.0 ± 0.0
A	<i>Tyrannus tyrannus</i>	Eastern Kingbird				S3S4B,S3S4M	3 Sensitive	3	15.6 ± 7.0
A	<i>Actitis macularius</i>	Spotted Sandpiper				S3S4B,S5M	4 Secure	19	11.1 ± 0.0
A	<i>Gallinago delicata</i>	Wilson's Snipe				S3S4B,S5M	4 Secure	1	15.6 ± 7.0
A	<i>Larus delawarensis</i>	Ring-billed Gull				S3S4B,S5M	4 Secure	29	10.7 ± 1.0
A	<i>Pluvialis squatarola</i>	Black-bellied Plover				S3S4M	4 Secure	1	12.8 ± 1.0
A	<i>Calidris pusilla</i>	Semipalmated Sandpiper				S3S4M	4 Secure	15	12.0 ± 1.0
A	<i>Calidris melanotos</i>	Pectoral Sandpiper				S3S4M	4 Secure	3	13.2 ± 0.0
A	<i>Morus bassanus</i>	Northern Gannet				SHB,S5M	4 Secure	7	12.0 ± 1.0
I	<i>Callophrys henrici</i>	Henry's Elfin				S2S3	4 Secure	1	12.7 ± 1.0
I	<i>Papilio brevicauda</i>	Short-tailed Swallowtail				S3	4 Secure	3	13.3 ± 0.0
I	<i>Papilio brevicauda bretonensis</i>	Short-tailed Swallowtail				S3	4 Secure	2	12.1 ± 0.0
I	<i>Lycaena dospassosi</i>	Salt Marsh Copper				S3	4 Secure	5	12.1 ± 0.0
I	<i>Boloria chariclea</i>	Arctic Fritillary				S3	4 Secure	1	12.5 ± 1.0
I	<i>Polygonia gracilis</i>	Hoary Comma				S3	4 Secure	1	12.5 ± 1.0
I	<i>Satyrium liparops</i>	Striped Hairstreak				S3S4	4 Secure	2	12.5 ± 1.0

4.3 LOCATION SENSITIVE SPECIES

The Department of Natural Resources in each Maritimes province considers a number of species “location sensitive”. Concern about exploitation of location-sensitive species precludes inclusion of precise coordinates in this report. Those intersecting your study area are indicated below with “YES”.

New Brunswick

Scientific Name	Common Name	SARA	Prov Legal Prot	Known within the Study Site?
<i>Chrysemys picta picta</i>	Eastern Painted Turtle			No
<i>Chelydra serpentina</i>	Snapping Turtle	Special Concern	Special Concern	No
<i>Glyptemys insculpta</i>	Wood Turtle	Threatened	Threatened	YES
<i>Haliaeetus leucocephalus</i>	Bald Eagle		Endangered	YES
<i>Falco peregrinus pop. 1</i>	Peregrine Falcon - anatum/tundrius pop.	Special Concern	Endangered	No
<i>Cicindela marginipennis</i>	Cobblestone Tiger Beetle	Endangered	Endangered	No
<i>Coenonympha nipisiquit</i>	Maritime Ringlet	Endangered	Endangered	No
<i>Bat Hibernaculum</i>		[Endangered] ¹	[Endangered] ¹	No

¹ *Myotis lucifugus* (Little Brown Myotis), *Myotis septentrionalis* (Long-eared Myotis), and *Perimyotis subflavus* (Tri-colored Bat or Eastern Pipistrelle) are all Endangered under the Federal Species at Risk Act and the NB Species at Risk Act.

4.4 SOURCE BIBLIOGRAPHY

The recipient of these data shall acknowledge the ACCDC and the data sources listed below in any documents, reports, publications or presentations, in which this dataset makes a significant contribution.

# recs	CITATION
1942	Pardieck, K.L. & Ziolkowski Jr., D.J.; Hudson, M.-A.R. 2014. North American Breeding Bird Survey Dataset 1966 - 2013, version 2013.0. U.S. Geological Survey, Patuxent Wildlife Research Center <www.pwrc.usgs.gov/BBS/RawData/>.
1237	Lepage, D. 2014. Maritime Breeding Bird Atlas Database. Bird Studies Canada, Sackville NB, 407,838 recs.
176	eBird. 2014. eBird Basic Dataset. Version: EBD_relNov-2014. Ithaca, New York. Nov 2014. Cornell Lab of Ornithology, 25036 recs.
164	Erskine, A.J. 1992. Maritime Breeding Bird Atlas Database. NS Museum & Nimbus Publ., Halifax, 82,125 recs.
45	Tims, J. & Craig, N. 1995. Environmentally Significant Areas in New Brunswick (NBESA). NB Dept of Environment & Nature Trust of New Brunswick Inc, 6042 recs.
10	Klymko, J.J.D. 2016. 2015 field data. Atlantic Canada Conservation Data Centre.
6	Benedict, B. Connell Herbarium Specimens (Data) . University New Brunswick, Fredericton. 2003.
6	Blaney, C.S.; Spicer, C.D.; Mazerolle, D.M. 2005. Fieldwork 2005. Atlantic Canada Conservation Data Centre. Sackville NB, 2333 recs.
4	Speers, L. 2008. Butterflies of Canada database: New Brunswick 1897-1999. Agriculture & Agri-Food Canada, Biological Resources Program, Ottawa, 2048 recs.
3	Klymko, J.J.D. 2014. Maritimes Butterfly Atlas, 2012 submissions. Atlantic Canada Conservation Data Centre, 8552 records.
3	Webster, R.P. & Edsall, J. 2007. 2005 New Brunswick Rare Butterfly Survey. Environmental Trust Fund, unpublished report, 232 recs.
2	Benedict, B. Connell Herbarium Specimen Database Download 2004. Connell Memorial Herbarium, University of New Brunswick. 2004.
2	Hinds, H.R. 1986. Notes on New Brunswick plant collections. Connell Memorial Herbarium, unpubl, 739 recs.
2	Thomas, A.W. 1996. A preliminary atlas of the butterflies of New Brunswick. New Brunswick Museum.
2	Tims, J. & Craig, N. 1995. Environmentally Significant Areas in New Brunswick (NBESA). NB Dept of Environment & Nature Trust of New Brunswick Inc.
2	Tingley, S. (compiler). 2001. Butterflies of New Brunswick. , Web site: www.geocities.com/Yosemite/8425/butrffly. 142 recs.
2	Wilhelm, S.I. et al. 2011. Colonial Waterbird Database.
2	Wilhelm, S.I. et al. 2011. Colonial Waterbird Database. Canadian Wildlife Service, Sackville, 2698 sites, 9718 recs (8192 obs).
1	Cdn Gazeteer
1	David, M. 2000. CNPA website. Club de naturalistes de la Peninsule acadienne (CNPA), www.francohone.net/cnpa/rares. 16 recs.
1	Dept of Fisheries & Oceans. 2001. Atlantic Salmon Maritime provinces overview for 2000. DFO.
1	Scott, Fred W. 1998. Updated Status Report on the Cougar (Puma Concolor cougar) [Eastern population]. Committee on the Status of Endangered Wildlife in Canada, 298 recs.
1	Sollows, M.C., 2008. NBM Science Collections databases: mammals. New Brunswick Museum, Saint John NB, download Jan. 2008, 4983 recs.
1	Sollows, M.C. 2008. NBM Science Collections databases: herpetiles. New Brunswick Museum, Saint John NB, download Jan. 2008, 8636 recs.

5.0 RARE SPECIES WITHIN 100 KM

A 100 km buffer around the study area contains 21234 records of 124 vertebrate and 556 records of 51 invertebrate fauna; 5012 records of 267 vascular, 113 records of 65 nonvascular flora (attached: *ob100km.xls).

Taxa within 100 km of the study site that are rare and/or endangered in the province in which the study site occurs. All ranks correspond to the province in which the study site falls, even for out-of-province records. Taxa are listed in order of concern, beginning with legally listed taxa, with the number of observations per taxon and the distance in kilometers from study area centroid to the closest observation (\pm the precision, in km, of the record).

Taxonomic Group	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)	Prov
A	<i>Myotis lucifugus</i>	Little Brown Myotis	Endangered	Endangered	Endangered	S1	1 At Risk	7	53.4 \pm 1.0	NB
A	<i>Myotis septentrionalis</i>	Northern Long-eared Myotis	Endangered	Endangered	Endangered	S1	1 At Risk	1	95.8 \pm 0.0	PE
A	<i>Charadrius melodus melodus</i>	Piping Plover melodus ssp	Endangered	Endangered	Endangered	S1B,S1M	1 At Risk	2549	15.6 \pm 7.0	NB
A	<i>Dermochelys coriacea</i> (Atlantic pop.)	Leatherback Sea Turtle - Atlantic pop.	Endangered	Endangered	Endangered	S1S2N	1 At Risk	4	13.1 \pm 1.0	NB
A	<i>Calidris canutus rufa</i>	Red Knot rufa ssp	Endangered		Endangered	S2M	1 At Risk	453	13.2 \pm 2.0	NB
A	<i>Rangifer tarandus pop. 2</i>	Woodland Caribou (Atlantic-Gasp -rsie pop.)	Endangered	Endangered	Extirpated	SX	0.1 Extirpated	4	23.9 \pm 1.0	NB
A	<i>Sturnella magna</i>	Eastern Meadowlark	Threatened		Threatened	S1B,S1M	2 May Be At Risk	5	12.7 \pm 7.0	NB
A	<i>Hylocichla mustelina</i>	Wood Thrush	Threatened		Threatened	S1S2B,S1S2M	2 May Be At Risk	42	5.5 \pm 7.0	NB
A	<i>Caprimulgus vociferus</i>	Whip-Poor-Will	Threatened	Threatened	Threatened	S2B,S2M	1 At Risk	43	9.7 \pm 7.0	NB
A	<i>Hirundo rustica</i>	Barn Swallow	Threatened		Threatened	S2B,S2M	3 Sensitive	544	4.7 \pm 7.0	NB
A	<i>Catharus bicknelli</i>	Bicknell's Thrush	Threatened	Special Concern	Threatened	S2B,S2M	1 At Risk	172	40.1 \pm 7.0	NB
A	<i>Glyptemys insculpta</i>	Wood Turtle	Threatened	Threatened	Threatened	S2S3	1 At Risk	392	10.9 \pm 1.0	NB
A	<i>Chaetura pelagica</i>	Chimney Swift	Threatened	Threatened	Threatened	S2S3B,S2M	1 At Risk	198	12.7 \pm 7.0	NB
A	<i>Riparia riparia</i>	Bank Swallow	Threatened		Threatened	S2S3B,S2S3M	3 Sensitive	479	4.7 \pm 7.0	NB
A	<i>Contopus cooperi</i>	Olive-sided Flycatcher	Threatened	Threatened	Threatened	S3B,S3M	1 At Risk	341	5.7 \pm 7.0	NB
A	<i>Wilsonia canadensis</i>	Canada Warbler	Threatened	Threatened	Threatened	S3B,S3M	1 At Risk	349	5.7 \pm 7.0	NB
A	<i>Dolichonyx oryzivorus</i>	Bobolink	Threatened		Threatened	S3B,S3M	3 Sensitive	566	4.7 \pm 7.0	NB
A	<i>Chordeiles minor</i>	Common Nighthawk	Threatened	Threatened	Threatened	S3B,S4M	1 At Risk	250	4.7 \pm 7.0	NB
A	<i>Anguilla rostrata</i>	American Eel	Threatened		Threatened	S4	4 Secure	7	17.4 \pm 1.0	NB
A	<i>Histrionicus histrionicus pop. 1</i>	Harlequin Duck - Eastern pop.	Special Concern	Special Concern	Endangered	S1B,S1S2N,S2M	1 At Risk	6	35.7 \pm 1.0	NB
A	<i>Falco peregrinus pop. 1</i>	Peregrine Falcon - anatum/tundrius	Special Concern	Special Concern	Endangered	S1B,S3M	1 At Risk	12	32.5 \pm 2.0	NB
A	<i>Asio flammeus</i>	Short-eared Owl	Special Concern	Special Concern	Special Concern	S2B,S2M	3 Sensitive	20	11.7 \pm 0.0	NB
A	<i>Bucephala islandica</i> (Eastern pop.)	Barrow's Goldeneye - Eastern pop.	Special Concern	Special Concern	Special Concern	S2M,S2N	3 Sensitive	49	11.7 \pm 0.0	NB
A	<i>Euphagus carolinus</i>	Rusty Blackbird	Special Concern	Special Concern	Special Concern	S3B,S3M	2 May Be At Risk	126	8.8 \pm 0.0	NB
A	<i>Coccothraustes vespertinus</i>	Evening Grosbeak	Special Concern			S3B,S3S4N,SUM	3 Sensitive	336	4.7 \pm 7.0	NB
A	<i>Phalaropus lobatus</i>	Red-necked Phalarope	Special Concern			S3M	3 Sensitive	6	41.2 \pm 1.0	NB
A	<i>Phocoena phocoena</i> (NW Atlantic pop.)	Harbour Porpoise - Northwest Atlantic pop.	Special Concern	Threatened		S4		2	67.5 \pm 5.0	NB
A	<i>Contopus virens</i>	Eastern Wood-Pewee	Special Concern		Special Concern	S4B,S4M	4 Secure	336	4.7 \pm 7.0	NB
A	<i>Podiceps auritus</i>	Horned Grebe	Special Concern		Special Concern	S4N,S4M	4 Secure	2	33.9 \pm 3.0	NB
A	<i>Odobenus rosmarus rosmarus</i>	Atlantic Walrus	Special Concern		Extirpated	SX		6	16.3 \pm 1.0	NB
A	<i>Bubo scandiacus</i>	Snowy Owl	Not At Risk			S1N,S2S3M	4 Secure	14	27.5 \pm 3.0	NB
A	<i>Fulica americana</i>	American Coot	Not At Risk			S1S2B,S1S2M	3 Sensitive	5	28.1 \pm 1.0	NB
A	<i>Aegolius funereus</i>	Boreal Owl	Not At Risk			S1S2B,SUM	2 May Be At Risk	16	14.6 \pm 7.0	NB
A	<i>Sorex dispar</i>	Long-tailed Shrew	Not At Risk	Special Concern		S2	3 Sensitive	8	95.5 \pm 1.0	NB
A	<i>Buteo lineatus</i>	Red-shouldered Hawk	Not At Risk	Special Concern		S2B,S2M	2 May Be At Risk	8	28.5 \pm 0.0	NB
A	<i>Chlidonias niger</i>	Black Tern	Not At Risk			S2B,S2M	3 Sensitive	5	51.3 \pm 0.0	NB

Taxonomic Group	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)	Prov
A	<i>Globicephala melas</i>	Long-finned Pilot Whale	Not At Risk			S2S3		1	8.6 ± 1.0	NB
A	<i>Lynx canadensis</i>	Canadian Lynx	Not At Risk		Endangered	S3	1 At Risk	37	24.3 ± 1.0	NB
A	<i>Sterna hirundo</i>	Common Tern	Not At Risk			S3B,SUM	3 Sensitive	659	10.2 ± 7.0	NB
A	<i>Podiceps grisegena</i>	Red-necked Grebe	Not At Risk			S3M,S2N	3 Sensitive	7	27.8 ± 0.0	NB
A	<i>Haliaeetus leucocephalus</i>	Bald Eagle	Not At Risk		Endangered	S4	1 At Risk	338	5.7 ± 7.0	NB
A	<i>Canis lupus</i>	Gray Wolf	Not At Risk		Extirpated	SX	0.1 Extirpated	1	64.4 ± 100.0	NB
A	<i>Puma concolor pop. 1</i>	Eastern Cougar	Data Deficient		Endangered	SU	5 Undetermined	42	10.8 ± 1.0	NB
A	<i>Morone saxatilis</i>	Striped Bass	E,E,SC			S3	2 May Be At Risk	14	12.7 ± 10.0	NB
A	<i>Salvelinus alpinus</i>	Arctic Char				S1	3 Sensitive	3	97.1 ± 1.0	NB
A	<i>Synaptomys borealis</i>	Northern Bog Lemming				S1	5 Undetermined	3	75.2 ± 1.0	NB
A	<i>Tringa melanoleuca</i>	Greater Yellowlegs				S1?B,S5M	4 Secure	822	12.8 ± 1.0	NB
A	<i>Aythya americana</i>	Redhead				S1B,S1M	8 Accidental	1	41.2 ± 1.0	NB
A	<i>Grus canadensis</i>	Sandhill Crane				S1B,S1M	8 Accidental	4	22.9 ± 1.0	NB
A	<i>Bartramia longicauda</i>	Upland Sandpiper				S1B,S1M	3 Sensitive	11	35.0 ± 7.0	NB
A	<i>Phalaropus tricolor</i>	Wilson's Phalarope				S1B,S1M	3 Sensitive	17	40.5 ± 7.0	NB
A	<i>Leucophaeus atricilla</i>	Laughing Gull				S1B,S1M	3 Sensitive	1	51.2 ± 0.0	NB
A	<i>Progne subis</i>	Purple Martin				S1B,S1M	2 May Be At Risk	3	52.0 ± 10.0	NB
A	<i>Thryothorus ludovicianus</i>	Carolina Wren				S1B,S1M	8 Accidental	1	30.1 ± 0.0	NB
A	<i>Oxyura jamaicensis</i>	Ruddy Duck				S1B,S2S3M	4 Secure	16	11.2 ± 0.0	NB
A	<i>Uria aalge</i>	Common Murre				S1B,S3N,S3M	4 Secure	3	57.4 ± 0.0	NB
A	<i>Aythya affinis</i>	Lesser Scaup				S1B,S4M	4 Secure	66	10.7 ± 1.0	NB
A	<i>Aythya marila</i>	Greater Scaup				S1B,S4M,S2N	4 Secure	17	12.9 ± 1.0	NB
A	<i>Eremophila alpestris</i>	Horned Lark				S1B,S4N,S5M	2 May Be At Risk	136	8.3 ± 7.0	NB
A	<i>Sterna paradisaea</i>	Arctic Tern				S1B,SUM	2 May Be At Risk	38	12.0 ± 1.0	NB
A	<i>Branta bernicla</i>	Brant				S1N, S2S3M	4 Secure	63	12.9 ± 1.0	NB
A	<i>Chroicocephalus ridibundus</i>	Black-headed Gull				S1N,S2M	3 Sensitive	9	41.2 ± 1.0	NB
A	<i>Butorides virescens</i>	Green Heron				S1S2B,S1S2M	3 Sensitive	2	40.5 ± 7.0	NB
A	<i>Nycticorax nycticorax</i>	Black-crowned Night-heron				S1S2B,S1S2M	3 Sensitive	246	35.7 ± 1.0	NB
A	<i>Empidonax traillii</i>	Willow Flycatcher				S1S2B,S1S2M	3 Sensitive	18	30.0 ± 0.0	NB
A	<i>Stelgidopteryx serripennis</i>	Northern Rough-winged Swallow				S1S2B,S1S2M	2 May Be At Risk	5	52.4 ± 0.0	NB
A	<i>Troglodytes aedon</i>	House Wren				S1S2B,S1S2M	5 Undetermined	4	35.0 ± 7.0	NB
A	<i>Rissa tridactyla</i>	Black-legged Kittiwake				S1S2B,S4N,S5M	4 Secure	22	58.6 ± 0.0	NB
A	<i>Calidris bairdii</i>	Baird's Sandpiper				S1S2M	3 Sensitive	28	13.0 ± 0.0	NB
A	<i>Mimus polyglottos</i>	Northern Mockingbird				S2B,S2M	3 Sensitive	61	5.7 ± 7.0	NB
A	<i>Toxostoma rufum</i>	Brown Thrasher				S2B,S2M	3 Sensitive	29	12.8 ± 1.0	NB
A	<i>Poocetes gramineus</i>	Vesper Sparrow				S2B,S2M	2 May Be At Risk	75	4.7 ± 7.0	NB
A	<i>Anas strepera</i>	Gadwall				S2B,S3M	4 Secure	71	18.3 ± 1.0	NB
A	<i>Alca torda</i>	Razorbill				S2B,S3N,S3M	4 Secure	7	61.3 ± 14.0	NB
A	<i>Pinicola enucleator</i>	Pine Grosbeak				S2B,S4S5N,S4S5M	3 Sensitive	48	8.3 ± 7.0	NB
A	<i>Tringa solitaria</i>	Solitary Sandpiper				S2B,S5M	4 Secure	78	12.0 ± 0.0	NB
A	<i>Oceanodroma leucorhoa</i>	Leach's Storm-Petrel				S2B,SUM	3 Sensitive	1	79.2 ± 0.0	NB
A	<i>Chen caerulescens</i>	Snow Goose				S2M	4 Secure	19	21.0 ± 0.0	NB
A	<i>Phalacrocorax carbo</i>	Great Cormorant				S2N,S2M	4 Secure	45	21.7 ± 1.0	NB
A	<i>Somateria spectabilis</i>	King Eider				S2N,S2M	4 Secure	2	33.9 ± 1.0	NB
A	<i>Larus hyperboreus</i>	Glaucous Gull				S2N,S2M	4 Secure	22	12.9 ± 0.0	NB
A	<i>Asio otus</i>	Long-eared Owl				S2S3	5 Undetermined	14	33.6 ± 1.0	NB
A	<i>Picoides dorsalis</i>	American Three-toed Woodpecker				S2S3	3 Sensitive	49	19.8 ± 7.0	NB
A	<i>Salmo salar</i>	Atlantic Salmon				S2S3	2 May Be At Risk	1326	17.4 ± 1.0	NB
A	<i>Anas clypeata</i>	Northern Shoveler				S2S3B,S2S3M	4 Secure	73	11.4 ± 0.0	NB
A	<i>Myiarchus crinitus</i>	Great Crested Flycatcher				S2S3B,S2S3M	3 Sensitive	25	14.6 ± 7.0	NB
A	<i>Petrochelidon</i>	Cliff Swallow				S2S3B,S2S3M	3 Sensitive	262	4.7 ± 7.0	NB

Taxonomic Group	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)	Prov
A	<i>pyrrhonota</i>									
A	<i>Pluvialis dominica</i>	American Golden-Plover				S2S3M	3 Sensitive	89	13.0 ± 0.0	NB
A	<i>Calcarius lapponicus</i>	Lapland Longspur				S2S3N,SUM	3 Sensitive	9	29.8 ± 0.0	NB
A	<i>Cephus grylle</i>	Black Guillemot				S3	4 Secure	52	32.5 ± 3.0	NB
A	<i>Loxia curvirostra</i>	Red Crossbill				S3	4 Secure	88	4.7 ± 7.0	NB
A	<i>Carduelis pinus</i>	Pine Siskin				S3	4 Secure	248	5.7 ± 7.0	NB
A	<i>Sorex maritimensis</i>	Maritime Shrew				S3	4 Secure	39	32.2 ± 0.0	NB
A	<i>Cathartes aura</i>	Turkey Vulture				S3B,S3M	4 Secure	10	28.1 ± 0.0	NB
A	<i>Rallus limicola</i>	Virginia Rail				S3B,S3M	3 Sensitive	15	32.1 ± 7.0	NB
A	<i>Charadrius vociferus</i>	Killdeer				S3B,S3M	3 Sensitive	747	4.7 ± 7.0	NB
A	<i>Tringa semipalmata</i>	Willet				S3B,S3M	3 Sensitive	464	9.5 ± 0.0	NB
A	<i>Coccyzus erythrophthalmus</i>	Black-billed Cuckoo				S3B,S3M	4 Secure	67	23.6 ± 7.0	NB
A	<i>Vireo gilvus</i>	Warbling Vireo				S3B,S3M	4 Secure	51	11.3 ± 0.0	NB
A	<i>Piranga olivacea</i>	Scarlet Tanager				S3B,S3M	4 Secure	52	21.9 ± 7.0	NB
A	<i>Passerina cyanea</i>	Indigo Bunting				S3B,S3M	4 Secure	18	12.4 ± 7.0	NB
A	<i>Molothrus ater</i>	Brown-headed Cowbird				S3B,S3M	2 May Be At Risk	156	4.7 ± 7.0	NB
A	<i>Icterus galbula</i>	Baltimore Oriole				S3B,S3M	4 Secure	59	23.6 ± 7.0	NB
A	<i>Somateria mollissima</i>	Common Eider				S3B,S4M,S3N	4 Secure	138	13.5 ± 1.0	NB
A	<i>Dendroica tigrina</i>	Cape May Warbler				S3B,S4S5M	4 Secure	216	9.7 ± 7.0	NB
A	<i>Anas acuta</i>	Northern Pintail				S3B,S5M	3 Sensitive	206	5.5 ± 7.0	NB
A	<i>Mergus serrator</i>	Red-breasted Merganser				S3B,S5M,S4S5N	4 Secure	292	5.5 ± 7.0	NB
A	<i>Arenaria interpres</i>	Ruddy Turnstone				S3M	4 Secure	760	12.8 ± 1.0	NB
A	<i>Phalaropus fulicarius</i>	Red Phalarope				S3M	3 Sensitive	4	17.8 ± 0.0	NB
A	<i>Melanitta nigra</i>	Black Scoter				S3M,S1S2N	3 Sensitive	142	11.7 ± 1.0	NB
A	<i>Bucephala albeola</i>	Bufflehead				S3M,S2N	3 Sensitive	37	12.0 ± 0.0	NB
A	<i>Calidris maritima</i>	Purple Sandpiper				S3M,S3N	4 Secure	19	41.6 ± 1.0	NB
A	<i>Synaptomys cooperi</i>	Southern Bog Lemming				S3S4	4 Secure	12	32.2 ± 0.0	NB
A	<i>Tyrannus tyrannus</i>	Eastern Kingbird				S3S4B,S3S4M	3 Sensitive	226	4.7 ± 7.0	NB
A	<i>Actitis macularius</i>	Spotted Sandpiper				S3S4B,S5M	4 Secure	1097	5.7 ± 7.0	NB
A	<i>Gallinago delicata</i>	Wilson's Snipe				S3S4B,S5M	4 Secure	352	15.6 ± 7.0	NB
A	<i>Larus delawarensis</i>	Ring-billed Gull				S3S4B,S5M	4 Secure	403	8.7 ± 0.0	NB
A	<i>Dendroica striata</i>	Blackpoll Warbler				S3S4B,S5M	4 Secure	114	9.7 ± 7.0	NB
A	<i>Pluvialis squatarola</i>	Black-bellied Plover				S3S4M	4 Secure	668	10.1 ± 1.0	NB
A	<i>Limosa haemastica</i>	Hudsonian Godwit				S3S4M	4 Secure	316	17.8 ± 0.0	NB
A	<i>Calidris pusilla</i>	Semipalmated Sandpiper				S3S4M	4 Secure	965	11.7 ± 0.0	NB
A	<i>Calidris melanotos</i>	Pectoral Sandpiper				S3S4M	4 Secure	119	13.2 ± 0.0	NB
A	<i>Calidris alba</i>	Sanderling				S3S4M,S1N	3 Sensitive	552	17.3 ± 2.0	NB
A	<i>Morus bassanus</i>	Northern Gannet				SHB,S5M	4 Secure	224	12.0 ± 1.0	NB
I	<i>Coenonympha nipisiquit</i>	Maritime Ringlet	Endangered	Endangered	Endangered	S1	1 At Risk	38	48.1 ± 7.0	NB
I	<i>Danaus plexippus</i>	Monarch	Endangered	Special Concern	Special Concern	S3B,S3M	3 Sensitive	16	35.5 ± 0.0	NB
I	<i>Ophiogomphus howei</i>	Pygmy Snaketail	Special Concern	Special Concern	Special Concern	S2	2 May Be At Risk	25	69.8 ± 0.0	NB
I	<i>Alasmodonta varicosa</i>	Brook Floater	Special Concern		Special Concern	S2	3 Sensitive	14	59.1 ± 0.0	NB
I	<i>Bombus terricola</i>	Yellow-banded Bumblebee	Special Concern			S3?	3 Sensitive	10	17.6 ± 0.0	NB
I	<i>Leucorhina patricia</i>	Canada Whiteface				S1	2 May Be At Risk	8	53.4 ± 1.0	NB
I	<i>Plebejus saepiolus</i>	Greenish Blue				S1S2	4 Secure	25	16.8 ± 7.0	NB
I	<i>Cicindela ancocisconensis</i>	Appalachian Tiger Beetle				S2	5 Undetermined	1	88.6 ± 0.0	NB
I	<i>Satyrium calanus</i>	Banded Hairstreak				S2	3 Sensitive	1	87.6 ± 7.0	NB
I	<i>Strymon melinus</i>	Grey Hairstreak				S2	4 Secure	8	12.1 ± 1.0	NB
I	<i>Somatochlora tenebrosa</i>	Clamp-Tipped Emerald				S2	5 Undetermined	5	44.8 ± 0.0	NB
I	<i>Ladona exusta</i>	White Corporal				S2	5 Undetermined	1	67.0 ± 0.0	NB
I	<i>Coenagrion interrogatum</i>	Subarctic Bluet				S2	3 Sensitive	6	26.0 ± 1.0	NB
I	<i>Callophrys henrici</i>	Henry's Elfin				S2S3	4 Secure	4	12.7 ± 1.0	NB

Taxonomic Group	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)	Prov
I	<i>Desmocerus palliatus</i>	Elderberry Borer				S3		2	13.2 ± 0.0	NB
I	<i>Carabus maeander</i>	a Ground Beetle				S3	5 Undetermined	1	70.0 ± 1.0	NB
I	<i>Hippodamia parenthesis</i>	Parenthesis Lady Beetle				S3	4 Secure	1	51.3 ± 1.0	NB
I	<i>Xylotrechus quadrimaculatus</i>	a Longhorned Beetle				S3		1	40.6 ± 1.0	NB
I	<i>Xylotrechus undulatus</i>	a Longhorned Beetle				S3		2	49.0 ± 1.0	NB
I	<i>Calathus gregarius</i>	a Ground Beetle				S3	4 Secure	1	63.1 ± 1.0	NB
I	<i>Hyperaspis disconotata</i>	a Ladybird Beetle				S3	5 Undetermined	1	79.2 ± 5.0	NB
I	<i>Hesperia sassacus</i>	Indian Skipper				S3	4 Secure	3	54.9 ± 7.0	NB
I	<i>Euphyes bimacula</i>	Two-spotted Skipper				S3	4 Secure	5	32.6 ± 10.0	NB
I	<i>Papilio brevicauda</i>	Short-tailed Swallowtail				S3	4 Secure	49	13.3 ± 0.0	NB
I	<i>Papilio brevicauda bretonensis</i>	Short-tailed Swallowtail				S3	4 Secure	16	12.1 ± 0.0	NB
I	<i>Lycaena hyllus</i>	Bronze Copper				S3	3 Sensitive	4	28.1 ± 0.0	NB
I	<i>Lycaena dospassosi</i>	Salt Marsh Copper				S3	4 Secure	117	8.5 ± 0.0	NB
I	<i>Satyrium acadica</i>	Acadian Hairstreak				S3	4 Secure	3	48.1 ± 7.0	NB
I	<i>Callophrys polios</i>	Hoary Elfin				S3	4 Secure	5	18.5 ± 7.0	NB
I	<i>Callophrys eryphon</i>	Western Pine Elfin				S3	4 Secure	6	14.4 ± 10.0	NB
I	<i>Plebejus idas</i>	Northern Blue				S3	4 Secure	32	19.3 ± 7.0	NB
I	<i>Plebejus idas empetri</i>	Crowberry Blue				S3	4 Secure	12	37.0 ± 0.0	NB
I	<i>Speyeria aphrodite</i>	Aphrodite Fritillary				S3	4 Secure	4	31.2 ± 1.0	NB
I	<i>Boloria eunomia</i>	Bog Fritillary				S3	5 Undetermined	5	28.9 ± 0.0	NB
I	<i>Boloria chariclea</i>	Arctic Fritillary				S3	4 Secure	13	12.5 ± 1.0	NB
I	<i>Boloria chariclea grandis</i>	Purple Lesser Fritillary				S3	4 Secure	4	14.4 ± 10.0	NB
I	<i>Polygonia satyrus</i>	Satyr Comma				S3	4 Secure	15	18.5 ± 7.0	NB
I	<i>Polygonia gracilis</i>	Hoary Comma				S3	4 Secure	21	12.5 ± 1.0	NB
I	<i>Nymphalis l-album</i>	Compton Tortoiseshell				S3	4 Secure	4	52.1 ± 10.0	NB
I	<i>Gomphus abbreviatus</i>	Spine-crowned Clubtail				S3	4 Secure	5	52.9 ± 0.0	NB
I	<i>Somatochlora albicincta</i>	Ringed Emerald				S3	4 Secure	2	84.0 ± 1.0	NB
I	<i>Somatochlora cingulata</i>	Lake Emerald				S3	4 Secure	3	23.2 ± 0.0	NB
I	<i>Somatochlora forcipata</i>	Forcipate Emerald				S3	4 Secure	11	16.0 ± 1.0	NB
I	<i>Williamsonia fletcheri</i>	Ebony Boghaunter				S3	4 Secure	3	51.5 ± 0.0	NB
I	<i>Lestes eurinus</i>	Amber-Winged Spreadwing				S3	4 Secure	12	28.8 ± 1.0	NB
I	<i>Stylurus scudderi</i>	Zebra Clubtail				S3	4 Secure	1	70.1 ± 0.0	NB
I	<i>Alasmidonta undulata</i>	Triangle Floater				S3	3 Sensitive	1	53.8 ± 1.0	NB
I	<i>Satyrium liparops</i>	Striped Hairstreak				S3S4	4 Secure	14	12.5 ± 1.0	NB
I	<i>Satyrium liparops strigosum</i>	Striped Hairstreak				S3S4	4 Secure	4	15.9 ± 1.0	NB
I	<i>Cupido comyntas</i>	Eastern Tailed Blue				S3S4	4 Secure	1	85.2 ± 1.0	NB
I	<i>Coccinella transversoguttata richardsoni</i>	Transverse Lady Beetle				SH	2 May Be At Risk	10	37.2 ± 1.0	NB
N	<i>Aulacomnium heterostichum</i>	One-sided Groove Moss				S1	2 May Be At Risk	1	49.0 ± 0.0	NB
N	<i>Campylostelium saxicola</i>	a Moss				S1	2 May Be At Risk	1	46.7 ± 0.0	NB
N	<i>Zygodon viridissimus</i>	a Moss				S1	2 May Be At Risk	1	47.7 ± 0.0	NB
N	<i>Bryum blindii</i>	a Moss				S1?	2 May Be At Risk	1	94.5 ± 1.0	NB
N	<i>Cinclidium stygium</i>	Sooty Cupola Moss				S1?	2 May Be At Risk	1	71.7 ± 0.0	NB
N	<i>Tortula cernua</i>	Narrow-Leafed Chain-Teeth Moss				S1?	2 May Be At Risk	1	94.5 ± 1.0	NB
N	<i>Dicranum bonjeanii</i>	Bonjean's Broom Moss				S1?	2 May Be At Risk	1	38.2 ± 1.0	NB

Taxonomic Group	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)	Prov
N	<i>Homomallium adnatum</i>	Adnate Hairy-gray Moss				S1?	2 May Be At Risk	1	47.9 ± 0.0	NB
N	<i>Paludella squarrosa</i>	Tufted Fen Moss				S1?	2 May Be At Risk	1	71.7 ± 0.0	NB
N	<i>Rhizomnium pseudopunctatum</i>	Feltd Leafy Moss				S1?	2 May Be At Risk	1	51.4 ± 0.0	NB
N	<i>Odontoschisma sphagni</i>	Bog-Moss Flapwort				S1S2	6 Not Assessed	1	42.1 ± 0.0	NB
N	<i>Pallavicinia lyellii</i>	Lyell's Ribbonwort				S1S2	6 Not Assessed	1	82.7 ± 1.0	NB
N	<i>Distichium inclinatum</i>	Inclined Iris Moss				S1S2	2 May Be At Risk	1	94.5 ± 1.0	NB
N	<i>Drummondia prorepens</i>	a Moss				S1S2	2 May Be At Risk	1	46.8 ± 0.0	NB
N	<i>Seligeria brevifolia</i>	a Moss				S1S2	3 Sensitive	4	48.0 ± 0.0	NB
N	<i>Calypogeia neesiana</i>	Nees' Pouchwort				S1S3	6 Not Assessed	1	32.2 ± 1.0	NB
N	<i>Cephalozia connivens</i>	Forcipated Pincerwort				S1S3	6 Not Assessed	1	97.1 ± 10.0	NB
N	<i>Lophozia badensis</i>	Dwarf Notchwort				S1S3	6 Not Assessed	1	94.5 ± 1.0	NB
N	<i>Meesia triquetra</i>	Three-ranked Cold Moss				S2	2 May Be At Risk	1	56.4 ± 10.0	NB
N	<i>Pohlia elongata</i>	Long-necked Nodding Moss				S2	3 Sensitive	4	46.5 ± 0.0	NB
N	<i>Pohlia sphagnicola</i>	a moss				S2	3 Sensitive	1	52.7 ± 0.0	NB
N	<i>Sphagnum lindbergii</i>	Lindberg's Peat Moss				S2	3 Sensitive	1	29.9 ± 0.0	NB
N	<i>Sphagnum flexuosum</i>	Flexuous Peatmoss				S2	3 Sensitive	2	76.7 ± 10.0	NB
N	<i>Tetradontium brownianum</i>	Little Georgia				S2	3 Sensitive	5	46.5 ± 0.0	NB
N	<i>Tortula mucronifolia</i>	Mucronate Screw Moss				S2	3 Sensitive	1	94.5 ± 1.0	NB
N	<i>Anomobryum filiforme</i>	a moss				S2	5 Undetermined	1	94.5 ± 1.0	NB
N	<i>Nephroma laevigatum</i>	Mustard Kidney Lichen				S2	2 May Be At Risk	3	55.6 ± 0.0	NB
N	<i>Anacamptodon splachnoides</i>	a Moss				S2?	3 Sensitive	1	70.6 ± 1.0	NB
N	<i>Bryum pallescens</i>	Pale Bryum Moss				S2?	5 Undetermined	1	64.3 ± 100.0	NB
N	<i>Sphagnum angermanicum</i>	a Peatmoss				S2?	3 Sensitive	1	44.8 ± 0.0	NB
N	<i>Collema leptaleum</i>	Crumpled Bat's Wing Lichen				S2?	5 Undetermined	1	48.9 ± 0.0	NB
N	<i>Bryum uliginosum</i>	a Moss				S2S3	3 Sensitive	1	91.1 ± 9.0	NB
N	<i>Orthotrichum speciosum</i>	Showy Bristle Moss				S2S3	5 Undetermined	5	47.9 ± 0.0	NB
N	<i>Pohlia prolifera</i>	Cottony Nodding Moss				S2S3	3 Sensitive	8	46.5 ± 0.0	NB
N	<i>Scorpidium scorpioides</i>	Hooked Scorpion Moss				S2S3	3 Sensitive	2	71.7 ± 0.0	NB
N	<i>Sphagnum subfulvum</i>	a Peatmoss				S2S3	2 May Be At Risk	2	52.7 ± 0.0	NB
N	<i>Zygodon viridissimus</i>	a Moss				S2S3	2 May Be At Risk	1	47.9 ± 0.0	NB
N	<i>Dendriocaulon umhausense</i>	a lichen				S2S3	3 Sensitive	1	46.3 ± 0.0	NB
N	<i>Schistidium maritimum</i>	a Moss				S3	4 Secure	1	51.4 ± 0.0	NB
N	<i>Collema nigrescens</i>	Blistered Tarpaper Lichen				S3	3 Sensitive	1	46.3 ± 0.0	NB
N	<i>Ahtiana aurescens</i>	Eastern Candlewax Lichen				S3	5 Undetermined	1	51.8 ± 0.0	NB
N	<i>Cladonia farinacea</i>	Farinose Pixie Lichen				S3	5 Undetermined	1	87.9 ± 0.0	PE
N	<i>Nephroma bellum</i>	Naked Kidney Lichen				S3	4 Secure	1	95.3 ± 0.0	PE
N	<i>Aulacomnium androgynum</i>	Little Groove Moss				S3?	4 Secure	4	49.0 ± 0.0	NB
N	<i>Dicranella rufescens</i>	Red Forklet Moss				S3?	5 Undetermined	1	32.5 ± 7.0	NB
N	<i>Barbula convoluta</i>	Lesser Bird's-claw Beard Moss				S3S4	4 Secure	1	99.8 ± 15.0	NB
N	<i>Dicranella varia</i>	a Moss				S3S4	4 Secure	1	91.1 ± 9.0	NB
N	<i>Dicranum majus</i>	Greater Broom Moss				S3S4	4 Secure	4	49.2 ± 0.0	NB
N	<i>Dicranum leioneuron</i>	a Dicranum Moss				S3S4	4 Secure	1	35.2 ± 10.0	NB
N	<i>Fissidens bryoides</i>	Lesser Pocket Moss				S3S4	4 Secure	2	73.5 ± 5.0	NB
N	<i>Heterocladium dimorphum</i>	Dimorphous Tangle Moss				S3S4	4 Secure	3	48.0 ± 0.0	NB
N	<i>Pogonatum dentatum</i>	Mountain Hair Moss				S3S4	4 Secure	1	46.9 ± 0.0	NB
N	<i>Sphagnum compactum</i>	Compact Peat Moss				S3S4	4 Secure	1	46.9 ± 1.0	NB
N	<i>Sphagnum torreyanum</i>	a Peatmoss				S3S4	4 Secure	1	72.2 ± 0.0	NB

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N	<i>Sphagnum contortum</i>	Twisted Peat Moss				S3S4	4 Secure	1	72.2 ± 0.0	NB
N	<i>Tetraphis geniculata</i>	Geniculate Four-tooth Moss				S3S4	4 Secure	3	54.4 ± 0.0	NB
N	<i>Tetraplodon angustatus</i>	Toothed-leaved Nitrogen Moss				S3S4	4 Secure	1	49.0 ± 0.0	NB
N	<i>Abietinella abietina</i>	Wiry Fern Moss				S3S4	4 Secure	1	91.1 ± 9.0	NB
N	<i>Rauivella scita</i>	Smaller Fern Moss				S3S4	3 Sensitive	1	53.2 ± 0.0	NB
N	<i>Pannaria rubiginosa</i>	Brown-eyed Shingle Lichen				S3S4	3 Sensitive	1	87.9 ± 0.0	PE
N	<i>Protopannaria pezizoides</i>	Brown-gray Moss-shingle Lichen				S3S4	4 Secure	1	87.9 ± 0.0	PE
N	<i>Pseudocyphellaria perpetua</i>	Gilded Specklebelly Lichen				S3S4	3 Sensitive	4	48.9 ± 0.0	NB
N	<i>Stereocaulon paschale</i>	Easter Foam Lichen				S3S4	5 Undetermined	1	61.1 ± 1.0	NB
N	<i>Leucodon brachypus</i>	a Moss				SH	2 May Be At Risk	9	46.3 ± 0.0	NB
N	<i>Splachnum luteum</i>	Yellow Collar Moss				SH	5 Undetermined	1	64.3 ± 100.0	NB
P	<i>Juglans cinerea</i>	Butternut	Endangered	Endangered	Endangered	S1	1 At Risk	18	51.7 ± 0.0	NB
P	<i>Symphyotrichum laurentianum</i>	Gulf of St Lawrence Aster	Threatened	Threatened	Endangered	S1	1 At Risk	31	36.1 ± 0.0	NB
P	<i>Symphyotrichum subulatum</i> (Bathurst pop)	Bathurst Aster - Bathurst pop.	Special Concern	Special Concern	Endangered	S2	1 At Risk	203	16.2 ± 0.0	NB
P	<i>Lechea maritima</i> var. <i>subcylindrica</i>	Beach Pinweed	Special Concern			S2	3 Sensitive	443	17.2 ± 0.0	NB
P	<i>Eriocaulon parkeri</i>	Parker's Pipewort	Not At Risk		Endangered	S2	1 At Risk	82	42.1 ± 1.0	NB
P	<i>Pterospora andromedea</i>	Woodland Pinedrops			Endangered	S1	1 At Risk	1	89.2 ± 0.0	NB
P	<i>Cryptotaenia canadensis</i>	Canada Honewort				S1	2 May Be At Risk	1	89.7 ± 1.0	NB
P	<i>Bidens eatonii</i>	Eaton's Beggarticks				S1	2 May Be At Risk	7	44.1 ± 0.0	NB
P	<i>Pseudognaphalium obtusifolium</i>	Eastern Cudweed				S1	2 May Be At Risk	4	18.3 ± 0.0	NB
P	<i>Betula glandulosa</i>	Glandular Birch				S1	2 May Be At Risk	8	83.2 ± 0.0	NB
P	<i>Betula michauxii</i>	Michaux's Dwarf Birch				S1	2 May Be At Risk	3	36.8 ± 0.0	NB
P	<i>Cynoglossum virginianum</i> var. <i>boreale</i>	Wild Comfrey				S1	2 May Be At Risk	3	64.0 ± 0.0	NB
P	<i>Cardamine parviflora</i> var. <i>arenicola</i>	Small-flowered Bittercress				S1	2 May Be At Risk	1	47.1 ± 0.0	NB
P	<i>Draba glabella</i>	Rock Whitlow-Grass				S1	2 May Be At Risk	7	86.4 ± 0.0	NB
P	<i>Draba incana</i>	Twisted Whitlow-grass				S1	2 May Be At Risk	6	66.2 ± 0.0	NB
P	<i>Stellaria crassifolia</i>	Fleshy Stitchwort				S1	2 May Be At Risk	1	22.2 ± 10.0	NB
P	<i>Stellaria longipes</i>	Long-stalked Starwort				S1	2 May Be At Risk	7	57.5 ± 1.0	NB
P	<i>Triadenum virginicum</i>	Virginia St John's-wort				S1	2 May Be At Risk	1	41.7 ± 0.0	NB
P	<i>Vaccinium boreale</i>	Northern Blueberry				S1	2 May Be At Risk	12	75.0 ± 1.0	NB
P	<i>Vaccinium uliginosum</i>	Alpine Bilberry				S1	2 May Be At Risk	5	83.2 ± 0.0	NB
P	<i>Chamaesyce polygonifolia</i>	Seaside Spurge				S1	2 May Be At Risk	7	41.9 ± 5.0	NB
P	<i>Bartonia virginica</i>	Yellow Bartonia				S1	2 May Be At Risk	3	38.9 ± 0.0	NB
P	<i>Ranunculus lapponicus</i>	Lapland Buttercup				S1	2 May Be At Risk	1	76.9 ± 0.0	NB
P	<i>Ranunculus sceleratus</i>	Cursed Buttercup				S1	2 May Be At Risk	3	62.7 ± 100.0	NB
P	<i>Salix serissima</i>	Autumn Willow				S1	2 May Be At Risk	4	70.3 ± 0.0	NB
P	<i>Agalinis paupercula</i> var. <i>borealis</i>	Small-flowered Agalinis				S1	2 May Be At Risk	9	58.1 ± 0.0	NB
P	<i>Carex bigelowii</i>	Bigelow's Sedge				S1	2 May Be At Risk	1	88.8 ± 0.0	NB
P	<i>Carex glareosa</i> var. <i>amphigena</i>	Gravel Sedge				S1	2 May Be At Risk	3	55.9 ± 1.0	NB
P	<i>Carex rariflora</i>	Loose-flowered Alpine Sedge				S1	2 May Be At Risk	8	75.7 ± 0.0	NB

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P	<i>Carex viridula</i> var. <i>elatior</i>	Greenish Sedge				S1	2 May Be At Risk	11	70.3 ± 0.0	NB
P	<i>Cyperus diandrus</i>	Low Flatsedge				S1	2 May Be At Risk	2	47.2 ± 0.0	NB
P	<i>Cyperus bipartitus</i>	Shining Flatsedge				S1	2 May Be At Risk	13	15.9 ± 0.0	NB
P	<i>Scirpus pendulus</i>	Hanging Bulrush				S1	2 May Be At Risk	1	93.5 ± 0.0	PE
P	<i>Schoenoplectus smithii</i>	Smith's Bulrush				S1	2 May Be At Risk	18	44.3 ± 0.0	NB
P	<i>Juncus greenei</i>	Greene's Rush				S1	2 May Be At Risk	3	40.3 ± 1.0	NB
P	<i>Juncus stygius</i>	Moor Rush				S1	2 May Be At Risk	1	67.9 ± 0.0	NB
P	<i>Juncus stygius</i> ssp. <i>americanus</i>	Moor Rush				S1	2 May Be At Risk	3	68.3 ± 5.0	NB
P	<i>Juncus subtilis</i>	Creeping Rush				S1	2 May Be At Risk	3	87.0 ± 0.0	NB
P	<i>Juncus trifidus</i>	Highland Rush				S1	2 May Be At Risk	5	88.8 ± 0.0	NB
P	<i>Allium canadense</i>	Canada Garlic				S1	2 May Be At Risk	1	60.0 ± 1.0	NB
P	<i>Zigadenus elegans</i> ssp. <i>glaucus</i>	Mountain Death Camas				S1	2 May Be At Risk	7	86.5 ± 0.0	NB
P	<i>Malaxis brachypoda</i>	White Adder's-Mouth				S1	2 May Be At Risk	2	70.3 ± 0.0	NB
P	<i>Calamagrostis stricta</i> ssp. <i>inexpansa</i>	Slim-stemmed Reed Grass				S1	2 May Be At Risk	1	52.1 ± 0.0	NB
P	<i>Catabrosa aquatica</i> var. <i>laurentiana</i>	Water Whorl Grass				S1	2 May Be At Risk	3	88.8 ± 5.0	PE
P	<i>Dichanthelium xanthophysum</i>	Slender Panic Grass				S1	2 May Be At Risk	3	44.2 ± 0.0	NB
P	<i>Puccinellia ambigua</i>	Dwarf Alkali Grass				S1	5 Undetermined	2	65.7 ± 0.0	NB
P	<i>Zizania aquatica</i> var. <i>brevis</i>	Indian Wild Rice				S1	2 May Be At Risk	16	15.9 ± 0.0	NB
P	<i>Potamogeton friesii</i>	Fries' Pondweed				S1	2 May Be At Risk	3	94.5 ± 0.0	PE
P	<i>Potamogeton nodosus</i>	Long-leaved Pondweed				S1	2 May Be At Risk	2	58.2 ± 0.0	NB
P	<i>Cystopteris laurentiana</i>	Laurentian Bladder Fern				S1	2 May Be At Risk	1	60.7 ± 0.0	NB
P	<i>Huperzia selago</i>	Northern Firmoss				S1	2 May Be At Risk	1	88.9 ± 0.0	NB
P	<i>Bidens heterodoxa</i>	Connecticut Beggar-Ticks				S1?	2 May Be At Risk	5	43.8 ± 1.0	NB
P	<i>Cuscuta campestris</i>	Field Dodder				S1?	2 May Be At Risk	3	60.5 ± 0.0	NB
P	<i>Carex laxiflora</i>	Loose-Flowered Sedge				S1?	5 Undetermined	1	96.8 ± 2.0	NB
P	<i>Rumex aquaticus</i> var. <i>fenestratus</i>	Western Dock				S1S2	2 May Be At Risk	2	64.5 ± 0.0	NB
P	<i>Carex crawei</i>	Crawe's Sedge				S1S2	2 May Be At Risk	1	28.3 ± 0.0	NB
P	<i>Thelypteris simulata</i>	Bog Fern				S1S2	2 May Be At Risk	1	37.7 ± 1.0	NB
P	<i>Cuscuta cephalanthi</i>	Buttonbush Dodder				S1S3	2 May Be At Risk	27	12.4 ± 1.0	NB
P	<i>Listera australis</i>	Southern Twayblade			Endangered	S2	1 At Risk	23	52.0 ± 0.0	NB
P	<i>Osmorhiza depauperata</i>	Blunt Sweet Cicely				S2	3 Sensitive	5	45.5 ± 1.0	NB
P	<i>Osmorhiza longistylis</i>	Smooth Sweet Cicely				S2	3 Sensitive	2	70.5 ± 0.0	NB
P	<i>Pseudognaphalium macounii</i>	Macoun's Cudweed				S2	3 Sensitive	40	87.3 ± 0.0	PE
P	<i>Ionactis linariifolius</i>	Stiff Aster				S2	3 Sensitive	55	40.9 ± 0.0	NB
P	<i>Symphyotrichum subulatum</i>	Annual Saltmarsh Aster				S2	1 At Risk	152	20.7 ± 0.0	NB
P	<i>Betula minor</i>	Dwarf White Birch				S2	3 Sensitive	4	88.8 ± 0.0	NB
P	<i>Arabis drummondii</i>	Drummond's Rockcress				S2	3 Sensitive	4	32.9 ± 1.0	NB
P	<i>Sagina nodosa</i>	Knotted Pearlwort				S2	3 Sensitive	4	56.2 ± 1.0	NB
P	<i>Sagina nodosa</i> ssp. <i>borealis</i>	Knotted Pearlwort				S2	3 Sensitive	1	98.9 ± 5.0	PE
P	<i>Stellaria longifolia</i>	Long-leaved Starwort				S2	3 Sensitive	1	46.7 ± 0.0	NB
P	<i>Atriplex franktonii</i>	Frankton's Saltbush				S2	4 Secure	4	23.9 ± 5.0	NB
P	<i>Chenopodium rubrum</i>	Red Pigweed				S2	3 Sensitive	12	17.1 ± 0.0	NB
P	<i>Astragalus euocosmus</i>	Elegant Milk-vetch				S2	2 May Be At Risk	1	58.2 ± 0.0	NB
P	<i>Oxytropis campestris</i> var. <i>johannensis</i>	Field Locoweed				S2	3 Sensitive	1	41.5 ± 10.0	NB

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P	<i>Gentiana linearis</i>	Narrow-Leaved Gentian				S2	3 Sensitive	4	81.1 ± 50.0	NB
P	<i>Myriophyllum humile</i>	Low Water Milfoil				S2	3 Sensitive	1	87.1 ± 1.0	NB
P	<i>Nuphar lutea ssp. rubrodisca</i>	Red-disked Yellow Pond-lily				S2	3 Sensitive	5	36.8 ± 0.0	NB
P	<i>Orobanche uniflora</i>	One-Flowered Broomrape				S2	3 Sensitive	2	69.8 ± 10.0	NB
P	<i>Polygonum amphibium var. emersum</i>	Water Smartweed				S2	3 Sensitive	1	58.2 ± 0.0	NB
P	<i>Podostemum ceratophyllum</i>	Horn-leaved Riverweed				S2	3 Sensitive	8	59.8 ± 1.0	NB
P	<i>Hepatica nobilis var. obtusa</i>	Round-lobed Hepatica				S2	3 Sensitive	4	60.4 ± 0.0	NB
P	<i>Ranunculus longirostris</i>	Eastern White Water-Crowfoot				S2	5 Undetermined	1	85.2 ± 1.0	NB
P	<i>Crataegus scabrada</i>	Rough Hawthorn				S2	3 Sensitive	2	44.3 ± 1.0	NB
P	<i>Rosa acicularis ssp. sayi</i>	Prickly Rose				S2	2 May Be At Risk	102	40.1 ± 0.0	NB
P	<i>Salix candida</i>	Sage Willow				S2	3 Sensitive	35	53.3 ± 0.0	NB
P	<i>Sagittaria calycina var. spongiosa</i>	Long-lobed Arrowhead				S2	4 Secure	144	15.9 ± 0.0	NB
P	<i>Carex granularis</i>	Limestone Meadow Sedge				S2	3 Sensitive	7	75.5 ± 5.0	NB
P	<i>Carex gynocrates</i>	Northern Bog Sedge				S2	3 Sensitive	12	70.3 ± 0.0	NB
P	<i>Carex hirtifolia</i>	Pubescent Sedge				S2	3 Sensitive	12	54.1 ± 0.0	NB
P	<i>Carex livida var. radicaulis</i>	Livid Sedge				S2	3 Sensitive	4	98.8 ± 0.0	NB
P	<i>Carex rostrata</i>	Narrow-leaved Beaked Sedge				S2	3 Sensitive	3	68.0 ± 5.0	NB
P	<i>Carex salina</i>	Saltmarsh Sedge				S2	3 Sensitive	14	23.9 ± 0.0	NB
P	<i>Carex spengelii</i>	Longbeak Sedge				S2	3 Sensitive	1	41.5 ± 0.0	NB
P	<i>Carex tenuiflora</i>	Sparse-Flowered Sedge				S2	2 May Be At Risk	2	33.6 ± 0.0	NB
P	<i>Carex albicans var. emmonsii</i>	White-tinged Sedge				S2	3 Sensitive	9	17.0 ± 0.0	NB
P	<i>Eriophorum gracile</i>	Slender Cottongrass				S2	2 May Be At Risk	9	76.7 ± 10.0	NB
P	<i>Blysmus rufus</i>	Red Bulrush				S2	3 Sensitive	63	22.1 ± 0.0	NB
P	<i>Juncus vaseyi</i>	Vasey Rush				S2	3 Sensitive	31	23.9 ± 0.0	NB
P	<i>Amerorchis rotundifolia</i>	Small Round-leaved Orchis				S2	2 May Be At Risk	12	53.2 ± 1.0	NB
P	<i>Calypso bulbosa var. americana</i>	Calypso				S2	2 May Be At Risk	5	60.4 ± 0.0	NB
P	<i>Coeloglossum viride var. virescens</i>	Long-bracted Frog Orchid				S2	2 May Be At Risk	1	80.3 ± 1.0	NB
P	<i>Cypripedium parviflorum var. makasin</i>	Small Yellow Lady's-Slipper				S2	2 May Be At Risk	2	25.7 ± 5.0	NB
P	<i>Goodyera oblongifolia</i>	Menzies' Rattlesnake-plantain				S2	3 Sensitive	25	45.5 ± 1.0	NB
P	<i>Spiranthes lucida</i>	Shining Ladies'-Tresses				S2	3 Sensitive	5	30.6 ± 0.0	NB
P	<i>Agrostis mertensii</i>	Northern Bent Grass				S2	2 May Be At Risk	57	40.3 ± 0.0	NB
P	<i>Dichanthelium linearifolium</i>	Narrow-leaved Panic Grass				S2	3 Sensitive	3	43.7 ± 0.0	NB
P	<i>Piptatherum canadense</i>	Canada Rice Grass				S2	3 Sensitive	3	44.2 ± 0.0	NB
P	<i>Poa glauca</i>	Glaucous Blue Grass				S2	4 Secure	3	60.7 ± 0.0	NB
P	<i>Puccinellia laurentiana</i>	Nootka Alkali Grass				S2	3 Sensitive	6	20.4 ± 0.0	NB
P	<i>Puccinellia phryganodes</i>	Creeping Alkali Grass				S2	3 Sensitive	2	91.5 ± 0.0	NB
P	<i>Zizania aquatica var. aquatica</i>	Indian Wild Rice				S2	5 Undetermined	7	38.3 ± 1.0	NB
P	<i>Piptatherum pungens</i>	Slender Rice Grass				S2	2 May Be At Risk	9	44.1 ± 1.0	NB
P	<i>Woodwardia virginica</i>	Virginia Chain Fern				S2	3 Sensitive	11	34.4 ± 0.0	NB
P	<i>Woodsia alpina</i>	Alpine Cliff Fern				S2	3 Sensitive	1	92.0 ± 0.0	NB

Taxonomic Group	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)	Prov
P	<i>Lycopodium sitchense</i>	Sitka Clubmoss				S2	3 Sensitive	2	88.6 ± 0.0	NB
P	<i>Selaginella selaginoides</i>	Low Spikemoss				S2	3 Sensitive	14	70.3 ± 0.0	NB
P	<i>Toxicodendron radicans</i>	Poison Ivy				S2?	3 Sensitive	3	81.3 ± 0.0	NB
P	<i>Symphotrichum novi-belgii</i> var. <i>crenifolium</i>	New York Aster				S2?	5 Undetermined	1	58.9 ± 0.0	NB
P	<i>Humulus lupulus</i> var. <i>lupuloides</i>	Common Hop				S2?	3 Sensitive	3	54.0 ± 0.0	NB
P	<i>Crataegus macrosperma</i>	Big-Fruit Hawthorn				S2?	5 Undetermined	1	44.3 ± 0.0	NB
P	<i>Galium obtusum</i>	Blunt-leaved Bedstraw				S2?	4 Secure	9	53.3 ± 0.0	NB
P	<i>Salix myricoides</i>	Bayberry Willow				S2?	3 Sensitive	3	11.9 ± 5.0	NB
P	<i>Carex vacillans</i>	Estuarine Sedge				S2?	3 Sensitive	3	32.9 ± 10.0	NB
P	<i>Platanthera huronensis</i>	Fragrant Green Orchid				S2?	5 Undetermined	1	41.6 ± 0.0	NB
P	<i>Barbarea orthoceras</i>	American Yellow Rocket				S2S3	3 Sensitive	1	81.8 ± 0.0	NB
P	<i>Ceratophyllum echinatum</i>	Prickly Hornwort				S2S3	3 Sensitive	1	44.9 ± 0.0	NB
P	<i>Callitriche hermaphroditica</i>	Northern Water-starwort				S2S3	4 Secure	4	6.6 ± 0.0	NB
P	<i>Elatine americana</i>	American Waterwort				S2S3	3 Sensitive	19	13.0 ± 0.0	NB
P	<i>Bartonia paniculata</i> ssp. <i>iodandra</i>	Branched Bartonia				S2S3	3 Sensitive	2	40.9 ± 0.0	NB
P	<i>Geranium robertianum</i>	Herb Robert				S2S3	4 Secure	47	87.4 ± 0.0	PE
P	<i>Epilobium coloratum</i>	Purple-veined Willowherb				S2S3	3 Sensitive	3	51.5 ± 10.0	NB
P	<i>Rumex maritimus</i> var. <i>persicarioides</i>	Peach-leaved Dock				S2S3	5 Undetermined	3	37.7 ± 0.0	NB
P	<i>Rumex pallidus</i>	Seabeach Dock				S2S3	3 Sensitive	7	14.7 ± 0.0	NB
P	<i>Rubus pensilvanicus</i>	Pennsylvania Blackberry				S2S3	4 Secure	9	49.5 ± 2.0	NB
P	<i>Galium labradoricum</i>	Labrador Bedstraw				S2S3	3 Sensitive	24	50.2 ± 5.0	NB
P	<i>Valeriana uliginosa</i>	Swamp Valerian				S2S3	3 Sensitive	8	70.3 ± 0.0	NB
P	<i>Carex adusta</i>	Lesser Brown Sedge				S2S3	4 Secure	8	21.1 ± 3.0	NB
P	<i>Juncus brachycephalus</i>	Small-Head Rush				S2S3	3 Sensitive	2	70.3 ± 0.0	NB
P	<i>Corallorhiza maculata</i> var. <i>occidentalis</i>	Spotted Coralroot				S2S3	3 Sensitive	1	63.2 ± 1.0	NB
P	<i>Corallorhiza maculata</i> var. <i>maculata</i>	Spotted Coralroot				S2S3	3 Sensitive	1	86.0 ± 10.0	NB
P	<i>Listera auriculata</i>	Auricled Twayblade				S2S3	3 Sensitive	16	27.5 ± 0.0	NB
P	<i>Spiranthes cernua</i>	Nodding Ladies'-Tresses				S2S3	3 Sensitive	1	99.6 ± 0.0	NB
P	<i>Stuckenia filiformis</i>	Thread-leaved Pondweed				S2S3	3 Sensitive	1	56.3 ± 1.0	NB
P	<i>Stuckenia pectinata</i>	Sago Pondweed				S2S3	3 Sensitive	26	24.5 ± 1.0	NB
P	<i>Potamogeton praelongus</i>	White-stemmed Pondweed				S2S3	4 Secure	4	49.5 ± 0.0	NB
P	<i>Isoetes acadensis</i>	Acadian Quillwort				S2S3	3 Sensitive	1	89.2 ± 0.0	NB
P	<i>Panax trifolius</i>	Dwarf Ginseng				S3	3 Sensitive	11	38.7 ± 5.0	NB
P	<i>Arnica lanceolata</i>	Lance-leaved Arnica				S3	4 Secure	27	40.5 ± 0.0	NB
P	<i>Artemisia campestris</i> ssp. <i>caudata</i>	Field Wormwood				S3	4 Secure	5	13.5 ± 0.0	NB
P	<i>Bidens hyperborea</i>	Estuary Beggarticks				S3	4 Secure	109	6.5 ± 0.0	NB
P	<i>Bidens hyperborea</i> var. <i>hyperborea</i>	Estuary Beggarticks				S3	4 Secure	13	27.6 ± 1.0	NB
P	<i>Erigeron hyssopifolius</i>	Hyssop-leaved Fleabane				S3	4 Secure	7	60.7 ± 0.0	NB
P	<i>Symphotrichum boreale</i>	Boreal Aster				S3	3 Sensitive	6	44.7 ± 5.0	NB
P	<i>Betula pumila</i>	Bog Birch				S3	4 Secure	143	22.0 ± 0.0	NB
P	<i>Arabis glabra</i>	Tower Mustard				S3	5 Undetermined	9	41.2 ± 0.0	NB

Taxonomic Group	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)	Prov
P	<i>Cardamine maxima</i>	Large Toothwort				S3	4 Secure	1	97.9 ± 0.0	NB
P	<i>Subularia aquatica</i> var. <i>americana</i>	Water Awlwort				S3	4 Secure	1	98.8 ± 1.0	NB
P	<i>Stellaria humifusa</i>	Saltmarsh Starwort				S3	4 Secure	14	23.9 ± 0.0	NB
P	<i>Hudsonia tomentosa</i>	Woolly Beach-heath				S3	4 Secure	192	16.8 ± 0.0	NB
P	<i>Crassula aquatica</i>	Water Pygmyweed				S3	4 Secure	49	6.9 ± 0.0	NB
P	<i>Elatine minima</i>	Small Waterwort				S3	4 Secure	5	45.9 ± 0.0	NB
P	<i>Hedysarum alpinum</i>	Alpine Sweet-vetch				S3	4 Secure	5	40.3 ± 0.0	NB
P	<i>Geranium bicknellii</i>	Bicknell's Crane's-bill				S3	4 Secure	7	25.0 ± 10.0	NB
P	<i>Myriophyllum farwellii</i>	Farwell's Water Milfoil				S3	4 Secure	5	49.1 ± 0.0	NB
P	<i>Myriophyllum verticillatum</i>	Whorled Water Milfoil				S3	4 Secure	10	32.9 ± 1.0	NB
P	<i>Teucrium canadense</i>	Canada Germander				S3	3 Sensitive	52	16.8 ± 0.0	NB
P	<i>Nuphar lutea</i> ssp. <i>pumila</i>	Small Yellow Pond-lily				S3	4 Secure	5	15.7 ± 0.0	NB
P	<i>Epilobium hornemannii</i>	Hornemann's Willowherb				S3	4 Secure	15	46.7 ± 0.0	NB
P	<i>Epilobium strictum</i>	Downy Willowherb				S3	4 Secure	4	28.6 ± 0.0	NB
P	<i>Polygala sanguinea</i>	Blood Milkwort				S3	3 Sensitive	21	68.3 ± 0.0	NB
P	<i>Polygonum arifolium</i>	Halberd-leaved Tearthumb				S3	4 Secure	28	33.8 ± 5.0	NB
P	<i>Polygonum punctatum</i>	Dotted Smartweed				S3	4 Secure	1	57.5 ± 2.0	NB
P	<i>Polygonum punctatum</i> var. <i>confertiflorum</i>	Dotted Smartweed				S3	4 Secure	37	13.7 ± 0.0	NB
P	<i>Polygonum scandens</i>	Climbing False Buckwheat				S3	4 Secure	47	21.7 ± 0.0	NB
P	<i>Littorella uniflora</i>	American Shoreweed				S3	4 Secure	1	98.4 ± 1.0	NB
P	<i>Samolus valerandi</i> ssp. <i>parviflorus</i>	Seaside Brookweed				S3	4 Secure	193	13.0 ± 2.0	NB
P	<i>Pyrola minor</i>	Lesser Pyrola				S3	4 Secure	11	5.5 ± 0.0	NB
P	<i>Clematis occidentalis</i>	Purple Clematis				S3	4 Secure	5	64.0 ± 1.0	NB
P	<i>Ranunculus gmelinii</i>	Gmelin's Water Buttercup				S3	4 Secure	17	23.5 ± 0.0	NB
P	<i>Thalictrum venulosum</i>	Northern Meadow-rue				S3	4 Secure	2	81.8 ± 0.0	NB
P	<i>Amelanchier canadensis</i>	Canada Serviceberry				S3	4 Secure	4	43.9 ± 0.0	NB
P	<i>Rosa palustris</i>	Swamp Rose				S3	4 Secure	4	38.7 ± 1.0	NB
P	<i>Sanguisorba canadensis</i>	Canada Burnet				S3	4 Secure	59	51.9 ± 5.0	NB
P	<i>Galium boreale</i>	Northern Bedstraw				S3	4 Secure	4	26.3 ± 1.0	NB
P	<i>Salix pedicellaris</i>	Bog Willow				S3	4 Secure	28	35.5 ± 0.0	NB
P	<i>Comandra umbellata</i>	Bastard's Toadflax				S3	4 Secure	74	13.3 ± 0.0	NB
P	<i>Comandra umbellata</i> ssp. <i>umbellata</i>	Bastard's Toadflax				S3	4 Secure	6	60.5 ± 0.0	NB
P	<i>Parnassia glauca</i>	Fen Grass-of-Parnassus				S3	4 Secure	14	58.9 ± 0.0	NB
P	<i>Limosella australis</i>	Southern Mudwort				S3	4 Secure	123	6.9 ± 0.0	NB
P	<i>Veronica serpyllifolia</i> ssp. <i>humifusa</i>	Thyme-Leaved Speedwell				S3	4 Secure	10	24.2 ± 1.0	NB
P	<i>Boehmeria cylindrica</i>	Small-spike False-nettle				S3	3 Sensitive	7	52.5 ± 0.0	NB
P	<i>Pilea pumila</i>	Dwarf Clearweed				S3	4 Secure	11	44.8 ± 0.0	NB
P	<i>Viola adunca</i>	Hooked Violet				S3	4 Secure	8	87.3 ± 0.0	NB
P	<i>Viola nephrophylla</i>	Northern Bog Violet				S3	4 Secure	7	70.3 ± 0.0	NB
P	<i>Carex aquatilis</i>	Water Sedge				S3	4 Secure	11	28.0 ± 0.0	NB
P	<i>Carex arcta</i>	Northern Clustered Sedge				S3	4 Secure	1	55.3 ± 0.0	NB
P	<i>Carex atratiformis</i>	Scabrous Black Sedge				S3	4 Secure	5	60.2 ± 0.0	NB
P	<i>Carex capillaris</i>	Hairlike Sedge				S3	4 Secure	2	71.3 ± 0.0	NB
P	<i>Carex chordorrhiza</i>	Creeping Sedge				S3	4 Secure	4	37.0 ± 0.0	NB
P	<i>Carex conoidea</i>	Field Sedge				S3	4 Secure	2	51.7 ± 10.0	NB
P	<i>Carex eburnea</i>	Bristle-leaved Sedge				S3	4 Secure	2	89.4 ± 0.0	NB
P	<i>Carex garberi</i>	Garber's Sedge				S3	3 Sensitive	21	40.4 ± 0.0	NB
P	<i>Carex haydenii</i>	Hayden's Sedge				S3	4 Secure	2	13.5 ± 0.0	NB

Taxonomic Group	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)	Prov
P	<i>Carex lupulina</i>	Hop Sedge				S3	4 Secure	1	80.1 ± 1.0	NB
P	<i>Carex michauxiana</i>	Michaux's Sedge				S3	4 Secure	3	63.8 ± 0.0	NB
P	<i>Carex ormostachya</i>	Necklace Spike Sedge				S3	4 Secure	9	6.9 ± 1.0	NB
P	<i>Carex tenera</i>	Tender Sedge				S3	4 Secure	3	6.6 ± 0.0	NB
P	<i>Carex tuckermanii</i>	Tuckerman's Sedge				S3	4 Secure	8	24.7 ± 10.0	NB
P	<i>Carex vaginata</i>	Sheathed Sedge				S3	3 Sensitive	8	70.3 ± 0.0	NB
P	<i>Carex wiegandii</i>	Wiegand's Sedge				S3	4 Secure	23	8.1 ± 1.0	NB
P	<i>Carex recta</i>	Estuary Sedge				S3	4 Secure	17	17.3 ± 2.0	NB
P	<i>Cyperus dentatus</i>	Toothed Flatsedge				S3	4 Secure	2	46.3 ± 10.0	NB
P	<i>Cyperus esculentus</i>	Perennial Yellow Nutsedge				S3	4 Secure	2	61.2 ± 0.0	NB
P	<i>Eleocharis intermedia</i>	Matted Spikerush				S3	4 Secure	2	13.7 ± 0.0	NB
P	<i>Eleocharis quinqueflora</i>	Few-flowered Spikerush				S3	4 Secure	1	94.7 ± 0.0	PE
P	<i>Rhynchospora capitellata</i>	Small-headed Beakrush				S3	4 Secure	58	40.6 ± 0.0	NB
P	<i>Rhynchospora fusca</i>	Brown Beakrush				S3	4 Secure	2	75.6 ± 0.0	NB
P	<i>Trichophorum clintonii</i>	Clinton's Clubrush				S3	4 Secure	52	40.3 ± 0.0	NB
P	<i>Schoenoplectus torreyi</i>	Torrey's Bulrush				S3	4 Secure	7	52.8 ± 0.0	NB
P	<i>Lemna trisulca</i>	Star Duckweed				S3	4 Secure	3	53.9 ± 2.0	NB
P	<i>Triantha glutinosa</i>	Sticky False-Asphodel				S3	4 Secure	4	59.4 ± 0.0	NB
P	<i>Cypripedium reginae</i>	Showy Lady's-Slipper				S3	3 Sensitive	22	23.0 ± 0.0	NB
P	<i>Liparis loeselii</i>	Loesel's Twayblade				S3	4 Secure	8	29.1 ± 0.0	NB
P	<i>Platanthera blephariglottis</i>	White Fringed Orchid				S3	4 Secure	112	8.6 ± 0.0	NB
P	<i>Platanthera grandiflora</i>	Large Purple Fringed Orchid				S3	3 Sensitive	12	47.3 ± 0.0	NB
P	<i>Bromus latiglumis</i>	Broad-Glumed Brome				S3	3 Sensitive	5	63.5 ± 0.0	NB
P	<i>Calamagrostis pickeringii</i>	Pickering's Reed Grass				S3	4 Secure	1	62.5 ± 0.0	NB
P	<i>Dichanthelium depauperatum</i>	Starved Panic Grass				S3	4 Secure	26	17.0 ± 0.0	NB
P	<i>Potamogeton obtusifolius</i>	Blunt-leaved Pondweed				S3	4 Secure	11	27.4 ± 0.0	NB
P	<i>Potamogeton richardsonii</i>	Richardson's Pondweed				S3	3 Sensitive	5	55.2 ± 4.0	NB
P	<i>Xyris montana</i>	Northern Yellow-Eyed-Grass				S3	4 Secure	85	21.9 ± 0.0	NB
P	<i>Zannichellia palustris</i>	Horned Pondweed				S3	4 Secure	86	6.7 ± 0.0	NB
P	<i>Adiantum pedatum</i>	Northern Maidenhair Fern				S3	4 Secure	2	70.5 ± 0.0	NB
P	<i>Cryptogramma stelleri</i>	Steller's Rockbrake				S3	4 Secure	3	60.1 ± 0.0	NB
P	<i>Asplenium trichomanes-ramosum</i>	Green Spleenwort				S3	4 Secure	4	60.7 ± 0.0	NB
P	<i>Dryopteris fragrans var. remotiuscula</i>	Fragrant Wood Fern				S3	4 Secure	24	49.0 ± 0.0	NB
P	<i>Woodsia glabella</i>	Smooth Cliff Fern				S3	4 Secure	1	89.4 ± 0.0	NB
P	<i>Equisetum palustre</i>	Marsh Horsetail				S3	4 Secure	1	90.5 ± 0.0	NB
P	<i>Isoetes tuckermanii</i>	Tuckerman's Quillwort				S3	4 Secure	3	45.9 ± 0.0	NB
P	<i>Lycopodium sabinifolium</i>	Ground-Fir				S3	4 Secure	11	17.7 ± 1.0	NB
P	<i>Huperzia appalachiana</i>	Appalachian Fir-Clubmoss				S3	3 Sensitive	7	32.9 ± 1.0	NB
P	<i>Botrychium dissectum</i>	Cut-leaved Moonwort				S3	4 Secure	1	94.5 ± 5.0	PE
P	<i>Botrychium lanceolatum var. angustisegmentum</i>	Lance-Leaf Grape-Fern				S3	3 Sensitive	4	54.0 ± 0.0	NB
P	<i>Botrychium simplex</i>	Least Moonwort				S3	4 Secure	10	53.3 ± 0.0	NB
P	<i>Mertensia maritima</i>	Sea Lungwort				S3S4	4 Secure	3	87.3 ± 2.0	NB
P	<i>Lobelia kalmii</i>	Brook Lobelia				S3S4	4 Secure	8	44.1 ± 0.0	NB
P	<i>Suaeda calceoliformis</i>	Horned Sea-blite				S3S4	4 Secure	43	17.1 ± 1.0	NB
P	<i>Myriophyllum sibiricum</i>	Siberian Water Milfoil				S3S4	4 Secure	9	13.5 ± 0.0	NB

Taxonomic Group	Scientific Name	Common Name	COSEWIC	SARA	Prov Legal Prot	Prov Rarity Rank	Prov GS Rank	# recs	Distance (km)	Prov
P	<i>Stachys pilosa</i>	Hairy Hedge-Nettle				S3S4	5 Undetermined	3	43.4 ± 0.0	NB
P	<i>Utricularia gibba</i>	Humped Bladderwort				S3S4	4 Secure	1	33.5 ± 1.0	NB
P	<i>Rumex maritimus</i>	Sea-Side Dock				S3S4	4 Secure	36	17.3 ± 0.0	NB
P	<i>Rumex maritimus</i> var. <i>fueginus</i>	Tierra del Fuego Dock				S3S4	4 Secure	16	35.8 ± 0.0	NB
P	<i>Potentilla arguta</i>	Tall Cinquefoil				S3S4	4 Secure	4	43.6 ± 0.0	NB
P	<i>Rubus chamaemorus</i>	Cloudberry				S3S4	4 Secure	169	8.6 ± 0.0	NB
P	<i>Geocaulon lividum</i>	Northern Comandra				S3S4	4 Secure	87	16.9 ± 0.0	NB
P	<i>Juniperus horizontalis</i>	Creeping Juniper				S3S4	4 Secure	11	50.6 ± 1.0	NB
P	<i>Cladium mariscoides</i>	Smooth Twigrush				S3S4	4 Secure	2	82.2 ± 0.0	NB
P	<i>Eriophorum russeolum</i>	Russet Cottongrass				S3S4	4 Secure	88	8.9 ± 1.0	NB
P	<i>Triglochin gaspensis</i>	Gasp Arrowgrass				S3S4	4 Secure	97	17.1 ± 0.0	NB
P	<i>Corallorhiza maculata</i>	Spotted Coralroot				S3S4	3 Sensitive	13	50.6 ± 1.0	NB
P	<i>Calamagrostis stricta</i>	Slim-stemmed Reed Grass				S3S4	4 Secure	23	17.2 ± 0.0	NB
P	<i>Calamagrostis stricta</i> var. <i>stricta</i>	Slim-stemmed Reed Grass				S3S4	4 Secure	6	71.9 ± 0.0	NB
P	<i>Distichlis spicata</i>	Salt Grass				S3S4	4 Secure	74	11.7 ± 0.0	NB
P	<i>Potamogeton oakesianus</i>	Oakes' Pondweed				S3S4	4 Secure	1	85.9 ± 0.0	NB
P	<i>Polygonum rail</i>	Sharp-fruited Knotweed				SH	0.1 Extirpated	7	40.3 ± 10.0	NB
P	<i>Montia fontana</i>	Water Blinks				SH	2 May Be At Risk	1	22.1 ± 1.0	NB
P	<i>Botrychium campestre</i>	Prairie Moonwort				SH	2 May Be At Risk	1	86.6 ± 0.0	NB
P	<i>Agalinis maritima</i>	Saltmarsh Agalinis				SX	0.1 Extirpated	2	62.6 ± 50.0	NB

5.1 SOURCE BIBLIOGRAPHY (100 km)

The recipient of these data shall acknowledge the ACCDC and the data sources listed below in any documents, reports, publications or presentations, in which this dataset makes a significant contribution.

# recs	CITATION
5645	Morrison, Guy. 2011. Maritime Shorebird Survey (MSS) database. Canadian Wildlife Service, Ottawa, 15939 surveys. 86171 recs.
4548	Lepage, D. 2014. Maritime Breeding Bird Atlas Database. Bird Studies Canada, Sackville NB, 407,838 recs.
2925	eBird. 2014. eBird Basic Dataset. Version: EBD_reINov-2014. Ithaca, New York. Nov 2014. Cornell Lab of Ornithology, 25036 recs.
2109	Erskine, A.J. 1992. Maritime Breeding Bird Atlas Database. NS Museum & Nimbus Publ., Halifax, 82,125 recs.
1310	Cowie, F. 2007. Electrofishing Population Estimates 1979-98. Canadian Rivers Institute, 2698 recs.
1162	Pardieck, K.L. & Ziolkowski Jr., D.J.; Hudson, M.-A.R. 2014. North American Breeding Bird Survey Dataset 1966 - 2013, version 2013.0. U.S. Geological Survey, Patuxent Wildlife Research Center <www.pwrc.usgs.gov/BBS/RawData/>.
857	Blaney, C.S.; Mazerolle, D.M. 2012. Fieldwork 2012. Atlantic Canada Conservation Data Centre, 13,278 recs.
760	Amirault, D.L. & Stewart, J. 2007. Piping Plover Database 1894-2006. Canadian Wildlife Service, Sackville, 3344 recs, 1228 new.
686	Blaney, C.S.; Mazerolle, D.M.; Belliveau, A.B. 2015. Atlantic Canada Conservation Data Centre Fieldwork 2015. Atlantic Canada Conservation Data Centre, # recs.
521	Tims, J. & Craig, N. 1995. Environmentally Significant Areas in New Brunswick (NBESA). NB Dept of Environment & Nature Trust of New Brunswick Inc, 6042 recs.
435	Beaudet, A. 2007. Piping Plover Records in Kouchibouguac NP, 1982-2005. Kouchibouguac National Park, 435 recs.
398	Blaney, C.S.; Spicer, C.D.; Mazerolle, D.M. 2005. Fieldwork 2005. Atlantic Canada Conservation Data Centre. Sackville NB, 2333 recs.
394	Blaney, C.S.; Mazerolle, D.M. 2010. Fieldwork 2010. Atlantic Canada Conservation Data Centre. Sackville NB, 15508 recs.
338	Amirault, D.L. & McKnight, J. 2003. Piping Plover Database 1991-2003. Canadian Wildlife Service, Sackville, unpublished data. 7 recs.
317	Blaney, C.S.; Mazerolle, D.M.; Belliveau, A.B. 2013. Atlantic Canada Conservation Data Centre Fieldwork 2013. Atlantic Canada Conservation Data Centre, 9000+ recs.
309	Gravel, Mireille. 2010. Coordonnées GPS et suivi des tortues marquées, 2005-07. Kouchibouguac National Park, 480 recs.
297	Benedict, B. Connell Herbarium Specimens. University New Brunswick, Fredericton. 2003.
239	Wilhelm, S.I. et al. 2011. Colonial Waterbird Database. Canadian Wildlife Service, Sackville, 2698 sites, 9718 recs (8192 obs).
133	Speers, L. 2008. Butterflies of Canada database: New Brunswick 1897-1999. Agriculture & Agri-Food Canada, Biological Resources Program, Ottawa, 2048 recs.
131	Hinds, H.R. 1986. Notes on New Brunswick plant collections. Connell Memorial Herbarium, unpubl, 739 recs.
129	Benedict, B. Connell Herbarium Specimens (Data) . University New Brunswick, Fredericton. 2003.
124	Blaney, C.S.; Spicer, C.D.; Rothfels, C. 2004. Fieldwork 2004. Atlantic Canada Conservation Data Centre. Sackville NB, 1343 recs.
123	Clayden, S.R. 1998. NBM Science Collections databases: vascular plants. New Brunswick Museum, Saint John NB, 19759 recs.
120	Belliveau, A.G. 2016. Atlantic Canada Conservation Data Centre Fieldwork 2016. Atlantic Canada Conservation Data Centre, 10695 recs.
114	Blaney, C.S.; Mazerolle, D.M.; Oberndorfer, E. 2007. Fieldwork 2007. Atlantic Canada Conservation Data Centre. Sackville NB, 13770 recs.

# recs	CITATION
103	Hicks, Andrew. 2009. Coastal Waterfowl Surveys Database, 2000-08. Canadian Wildlife Service, Sackville, 46488 recs (11149 non-zero).
96	Canadian Wildlife Service, Dartmouth. 2010. Piping Plover censuses 2007-09, 304 recs.
94	Campbell, G. 2017. Maritimes Bicknell's Thrush database 2002-2015. Bird Studies Canada, Sackville NB, 609 recs.
91	Tremblay, E. 2006. Kouchibouguac National Park Digital Database. Parks Canada, 105 recs.
87	Mazerolle, D.M. 2005. Bouctouche Irving Eco-Centre rare coastal plant fieldwork results 2004-05. Irving Eco-centre, la Dune du Bouctouche, 174 recs.
86	Coursol, F. 2005. Dataset from New Brunswick fieldwork for <i>Eriocaulon parkeri</i> COSEWIC report. Coursol, Pers. comm. to C.S. Blaney, Aug 26. 110 recs.
77	Klymko, J.J.D. 2016. 2015 field data. Atlantic Canada Conservation Data Centre.
65	Blaney, C.S.; Mazerolle, D.M.; Klymko, J.; Spicer, C.D. 2006. Fieldwork 2006. Atlantic Canada Conservation Data Centre. Sackville NB, 8399 recs.
65	Klymko, J.J.D. 2014. Maritimes Butterfly Atlas, 2012 submissions. Atlantic Canada Conservation Data Centre, 8552 records.
64	Mazerolle, D.M. 2016. Atlantic Canada Conservation Data Centre Fieldwork 2016. Atlantic Canada Conservation Data Centre, 11311 recs.
60	Amirault, D.L. 2000. Piping Plover Surveys, 1983-2000. Canadian Wildlife Service, Sackville, unpublished data. 70 recs.
60	Blaney, C.S.; Spicer, C.D.; Popma, T.M.; Hanel, C. 2002. Fieldwork 2002. Atlantic Canada Conservation Data Centre. Sackville NB, 2252 recs.
59	Hilaire Chiasson Rare vascular plant specimens in the Hilaire Chiasson Herbarium. 2015.
58	Blaney, C.S.; Mazerolle, D.M. 2011. Fieldwork 2011. Atlantic Canada Conservation Data Centre. Sackville NB.
57	Belland, R.J. Maritimes moss records from various herbarium databases. 2014.
56	Benedict, B. Connell Herbarium Specimen Database Download 2004. Connell Memorial Herbarium, University of New Brunswick. 2004.
55	Thomas, A.W. 1996. A preliminary atlas of the butterflies of New Brunswick. New Brunswick Museum.
52	Blaney, C.S. 2000. Fieldwork 2000. Atlantic Canada Conservation Data Centre. Sackville NB, 1265 recs.
45	Bateman, M.C. 2001. Coastal Waterfowl Surveys Database, 1965-2001. Canadian Wildlife Service, Sackville, 667 recs.
44	Tranquilla, L. 2015. Maritimes Marsh Monitoring Project 2015 data. Bird Studies Canada, Sackville NB, 5062 recs.
42	Blaney, C.S.; Mazerolle, D.M. 2008. Fieldwork 2008. Atlantic Canada Conservation Data Centre. Sackville NB, 13343 recs.
41	Klymko, J.J.D. 2012. Maritimes Butterfly Atlas, 2010 and 2011 records. Atlantic Canada Conservation Data Centre, 6318 recs.
40	Sollows, M.C., 2008. NBM Science Collections databases: mammals. New Brunswick Museum, Saint John NB, download Jan. 2008, 4983 recs.
39	Brunelle, P.-M. (compiler). 2009. ADIP/MDDS Odonata Database: data to 2006 inclusive. Atlantic Dragonfly Inventory Program (ADIP), 24200 recs.
37	Allen, K. 2012. Rare plant spatial data from Pleasant Ridge cranberry farm. NB Department of Environment, Environmental Assessment Section, 39 recs.
37	Catling, P.M., Erskine, D.S. & MacLaren, R.B. 1985. The Plants of Prince Edward Island with new records, nomenclatural changes & corrections & deletions, 1st Ed. Research Branch, Agriculture Canada, Ottawa, Publication 1798. 22pp.
37	Robinson, S.L. 2010. Fieldwork 2009 (dune ecology). Atlantic Canada Conservation Data Centre. Sackville NB, 408 recs.
34	Blaney, C.S. 2016. Atlantic Canada Conservation Data Centre Fieldwork 2016. Atlantic Canada Conservation Data Centre, 6719 recs.
34	Scott, Fred W. 1998. Updated Status Report on the Cougar (<i>Puma concolor couguar</i>) [Eastern population]. Committee on the Status of Endangered Wildlife in Canada, 298 recs.
31	Blaney, C.S.; Mazerolle, D.M. 2009. Fieldwork 2009. Atlantic Canada Conservation Data Centre. Sackville NB, 13395 recs.
31	Clayden, S.R. 2007. NBM Science Collections databases: vascular plants. New Brunswick Museum, Saint John NB, download Mar. 2007, 6914 recs.
31	Erskine, A.J. 1999. Maritime Nest Records Scheme (MNRS) 1937-1999. Canadian Wildlife Service, Sackville, 313 recs.
30	Campbell, G., Villamil, L. 2012. Heath Steele Mine Bird Surveys 2012.
29	Robinson, S.L. 2015. 2014 field data.
28	Plissner, J.H. & Haig, S.M. 1997. 1996 International piping plover census. US Geological Survey, Corvallis OR, 231 pp.
28	Wood Turtle (<i>Glyptemys insculpta</i>) Miramichi Watershed Synopsis 2013 Compiled by: Vladimir King Trajkovic, EPT Miramichi River Environmental Assessment Committee
26	Manthorne, A. 2014. MaritimesSwiftwatch Project database 2013-2014. Bird Studies Canada, Sackville NB, 326 recs.
26	Webster, R.P. & Edsall, J. 2007. 2005 New Brunswick Rare Butterfly Survey. Environmental Trust Fund, unpublished report, 232 recs.
23	Bagnell, B.A. 2001. New Brunswick Bryophyte Occurrences. B&B Botanical, Sussex, 478 recs.
23	Hinds, H.R. 1999. Connell Herbarium Database. University New Brunswick, Fredericton, 131 recs.
21	Kouchibouguac National Park, Natural Resource Conservation Sec. 1988. The Resources of Kouchibouguac National Park. Beach, H. (ed.) , 90 recs.
21	Mazerolle, M.J., Drolet, B., & Desrochers, A. 2001. Small Mammal Responses to Peat Mining of Southeastern Canadian Bogs. <i>Can. J. Zool.</i> , 79:296-302. 21 recs.
20	Doucet, D.A. & Edsall, J. 2007. <i>Ophiogomphus howei</i> records. Atlantic Canada Conservation Data Centre, Sackville NB, 21 recs.
20	McAlpine, D.F. 1998. NBM Science Collections: Wood Turtle records. New Brunswick Museum, Saint John NB, 329 recs.
18	Klymko, J.J.D. 2016. 2014 field data. Atlantic Canada Conservation Data Centre.
17	Boyne, A.W. 2000. Tern Surveys. Canadian Wildlife Service, Sackville, unpublished data. 168 recs.
17	Chiasson, R. & Dietz, S. 1998. Piper Project Report of Common Tern Observations. Corvus Consulting, Tabusintac NB, 20 recs.
16	Curley, F.R. 2005. PEF&W Collection 2003-04. PEI Fish & Wildlife Div., 716 recs.
16	Donell, R. 2008. Rare plant records from rare coastal plant project. Bouctouche Dune Irving Eco-centre. Pers. comm. to D.M. Mazerolle, 50 recs.
16	Doucet, D.A. 2007. Lepidopteran Records, 1988-2006. Doucet, 700 recs.
16	Gautreau-Daigle, H. 2007. Rare plant records from peatland surveys. Coastal Zones Research Institute, Shippagan NB. Pers. comm. to D.M. Mazerolle, 39 recs.
16	Majka, C. 2009. Université de Moncton Insect Collection: Carabidae, Cerambycidae, Coccinellidae. Université de Moncton, 540 recs.
16	Mazerolle, D. 2003. Assessment of Seaside Pinweed (<i>Lechea maritima</i> var. <i>subcylindrica</i>) in Southeastern New Brunswick. Irving Eco-centre, la Dune du Bouctouche, 18 recs.
15	Belland, R.J. 1992. The Bryophytes of Kouchibouguac National Park. Parks Canada, Kouchibouguac NP, 101 pp. + map.
14	David, M. 2000. CNPA website. Club de naturalistes de la Peninsule acadienne (CNPA), www.francophone.net/cnpa/rares. 16 recs.

# recs	CITATION
14	Morton, L.D. & Savoie, M. 1983. The Mammals of Kouchibouguac National Park. Parks Canada Report prep. by Canadian Wildlife Service, Sackville, NB, Vols 1-4. 14 recs.
14	Tingley, S. (compiler). 2001. Butterflies of New Brunswick. , Web site: www.geocities.com/Yosemite/8425/butterfly. 142 recs.
12	Doucet, D.A. & Edsall, J.; Brunelle, P.-M. 2007. Miramichi Watershed Rare Odonata Survey. New Brunswick ETF & WTF Report, 1211 recs.
12	Toner, M. 2005. Lynx Records 1996-2005. NB Dept of Natural Resources, 48 recs.
11	Canadian Wildlife Service, Atlantic Region. 2010. Piping Plover censuses 2006-09. , 35 recs.
11	Dept of Fisheries & Oceans. 1999. Status of Wild Striped Bass, & Interaction between Wild & Cultured Striped Bass in the Maritime Provinces. , Science Stock Status Report D3-22. 13 recs.
11	Edsall, J. 2001. Lepidopteran records in New Brunswick, 1997-99. , Pers. comm. to K.A. Bredin. 91 recs.
10	Klymko, J.J.D.; Robinson, S.L. 2012. 2012 field data. Atlantic Canada Conservation Data Centre, 447 recs.
10	Klymko, J.J.D.; Robinson, S.L. 2014. 2013 field data. Atlantic Canada Conservation Data Centre.
10	Munro, Marian K. Nova Scotia Provincial Museum of Natural History Herbarium Database. Nova Scotia Provincial Museum of Natural History, Halifax, Nova Scotia. 2013.
10	Tremblay, E. 2001. Kouchibouguac River Freshwater Mussel Data. Parks Canada, Kouchibouguac NP, 45 recs.
10	Webster, R.P. 2001. R.P. Webster Collection. R. P. Webster, 39 recs.
9	Mawhinney, K. & Seutin, G. 2001. Lepidoptera Survey of the Salt Marshes of Kouchibouguac National Park. Parks Canada Unpublished Report, 5p. 9 recs.
8	Busby, D.G. 1999. 1997-1999 Bicknell's Thrush data, unpublished files. Canadian Wildlife Service, Sackville, 17 recs.
8	Pike, E., Tingley, S. & Christie, D.S. 2000. Nature NB Listserve. University of New Brunswick, listserv.unb.ca/archives/naturenb. 68 recs.
8	Speers, L. 2001. Butterflies of Canada database. Agriculture & Agri-Food Canada, Biological Resources Program, Ottawa, 190 recs.
7	Bateman, M.C. 2000. Waterfowl Brood Surveys Database, 1990-2000 . Canadian Wildlife Service, Sackville, unpublished data. 149 recs.
7	Blaney, C.S.; Spicer, C.D. 2001. Fieldwork 2001. Atlantic Canada Conservation Data Centre. Sackville NB, 981 recs.
7	Burns, L. 2013. Personal communication concerning bat occurrence on PEI. Winter 2013. Pers. comm.
7	Toner, M. 2005. NB DNR fieldwork on Parker's Pipewort. NB Dept of Natural Resources. Pers. comm to C.S. Blaney, Dec 12, 8 recs.
6	Edsall, J. 2007. Personal Butterfly Collection: specimens collected in the Canadian Maritimes, 1961-2007. J. Edsall, unpubl. report, 137 recs.
6	Gowan, S. 1980. The Lichens of Kouchibouguac National Park, Parts I (Macrolichens) & II (Microlichens). National Museum of Natural Sciences. Ottawa, ON, 7 recs.
6	McLeod, D. & Merrithew, C. 2005. The Inventory of the Flora and Fauna of the French Fort Cove Nature Park. French Fort Cove Development Commission, 7 recs.
6	McMullin, R.T. 2015. Prince Edward Island's lichen biodiversity and proposed conservation status in a report prepared for the province of PEI. Biodiversity Institute of Ontario Herbarium, University of Guelph, 776 records.
6	Sollows, M.C. 2008. NBM Science Collections databases: herpetiles. New Brunswick Museum, Saint John NB, download Jan. 2008, 8636 recs.
5	Amirault, D.L. 1997-2000. Unpublished files. Canadian Wildlife Service, Sackville, 470 recs.
5	Benedict, B. Connell Herbarium Specimens. University New Brunswick, Fredericton. 2000.
5	Chaput, G. 2002. Atlantic Salmon: Maritime Provinces Overview for 2001. Dept of Fisheries & Oceans, Atlantic Region, Science Stock Status Report D3-14. 39 recs.
5	Curley, F.R. 2007. PEF&W Collection. PEI Fish & Wildlife Div., 199 recs.
5	Doucet, D.A. 2008. Fieldwork 2008: Odonata. ACCDC Staff, 625 recs.
5	Doucet, D.A. 2008. Wood Turtle Records 2002-07. Pers. comm. to S. Gerriets, 7 recs, 7 recs.
5	Holder, M. & Kingsley, A.L. 2000. Peatland Insects in NB & NS: Results of surveys in 10 bogs during summer 2000. Atlantic Canada Conservation Data Centre, Sackville, 118 recs.
5	Klymko, J.J.D. 2012. Insect fieldwork & submissions, 2003-11. Atlantic Canada Conservation Data Centre. Sackville NB, 1337 recs.
5	Mazerolle, D. 2003. Assessment and Rehabilitation of the Gulf of St Lawrence Aster (<i>Symphyotrichum laurentianum</i>) in Southeastern New Brunswick. Irving Eco-centre, la Dune du Bouctouche, 13 recs.
5	Sollows, M.C., 2009. NBM Science Collections databases: molluscs. New Brunswick Museum, Saint John NB, download Jan. 2009, 6951 recs (2957 in Atlantic Canada).
5	Spicer, C.D. 2002. Fieldwork 2002. Atlantic Canada Conservation Data Centre. Sackville NB, 211 recs.
5	Benedict, B. Connell Herbarium Specimens, Digital photos. University New Brunswick, Fredericton. 2005.
4	Blaney, C.S. 1999. Fieldwork 1999. Atlantic Canada Conservation Data Centre. Sackville NB, 292 recs.
4	Dalton, M. & Saba, B.A. 1980. A preliminary report on the natural history of the Gaspé shrew. The Atlantic Center for the Environment, Ipwich, MA, 29 pp.
4	Erskine, D. 1960. The plants of Prince Edward Island, 1st Ed. Research Branch, Agriculture Canada, Ottawa., Publication 1088. 1238 recs.
4	Gagnon, J. 2004. Specimen data from 2002 visit to Prince Edward Island. , 104 recs.
4	Godbout, V. 2000. Recherche de l'Aster du St-Laurent (<i>Aster laurentianus</i>) et du Satyre des Maritimes (<i>Coenonympha nepisquit</i>) au Parc national Kouchibouguac et a Dune du Bouctouche, N-B. Irving Eco-centre, 23 pp.
4	Goltz, J.P. 2002. Botany Ramblings: 1 July to 30 September, 2002. N.B. Naturalist, 29 (3):84-92. 7 recs.
4	Hoyt, J.S. 2001. Assessment and update status report on the Bathurst Aster (<i>Symphyotrichum subulatum</i>) in Canada. Committee on the Status of Endangered Wildlife in Canada, 4 recs.
4	McLeod, D. & Saunders, J. 2004. <i>Cypripedium reginae</i> . Pers. comm. to C.S. Blaney. 4 recs, 4 recs.
4	Parks Canada. 2010. Specimens in or near National Parks in Atlantic Canada. Canadian National Museum, 3925 recs.
4	Webster, R.P. 1997. Status Report on Maritime Ringlet (<i>Coenonympha nipisquit</i>) in Canada. Committee on the Status of Endangered Wildlife in Canada, 4 recs.
3	Bouchard, A. Herbar Marie-Victorin. Universite de Montreal, Montreal QC. 1999.
3	Chaput, G. 1999. Atlantic Salmon: Miramichi & SFA 16 Rivers. Dept of Fisheries & Oceans, Atlantic Region, Science Stock Status Report D3-05. 6 recs.
3	Cowie, Faye. 2007. Surveyed Lakes in New Brunswick. Canadian Rivers Institute, 781 recs.
3	Dibblee, R.L. 1999. PEI Cormorant Survey. Prince Edward Island Fisheries, Aquaculture & Environment, 1p. 21 recs.
3	Gautreau, R. 2005. <i>Betula michauxii</i> occurrence on Bog 324, near Baie-Ste-Anne, NB. Pers. comm. to C.S. Blaney, 3 recs.
3	Gauvin, J.M. 1979. Etude de la vegetation des marais sales du parc national Kouchibouguac, N-B. M.Sc. Thesis, Universite de Moncton, 248 pp.
3	Godbout, Valérie. 2010. Étude de l'Aster du Saint-Laurent dans le parc national Kouchibouguac, 2000-04. Parks Canada, 3 recs.
3	Grondin, P. & Blouin, J.-L., Bouchard, D.; et al. 1981. Description et cartographie de la vegetation du cordon littoral. Parc National de Kouchibouguac. Le Groupe Dryade, 57 pp.
3	McAlpine, D.F. 1998. NBM Science Collections databases to 1998. New Brunswick Museum, Saint John NB, 241 recs.
3	Nelson Poirier. 2009. Rare plant finds in the Exmoor & Lyttleton areas. Pers. comm. to S. Blaney. 4 recs, 4 recs.

# recs	CITATION
3	Sollows, M.C., 2009. NBM Science Collections databases: Coccinellid & Cerambycid Beetles. New Brunswick Museum, Saint John NB, download Feb. 2009, 569 recs.
3	Spicer, C.D. 2004. Specimens from CWS Herbarium, Mount Allison Herbarium Database. Mount Allison University, 5939 recs.
2	Basquill, S.P. 2003. Fieldwork 2003. Atlantic Canada Conservation Data Centre, Sackville NB, 69 recs.
2	Donelle, R. 2007. Bouctouche Dune Rare Coastal Plant Data. Irving Eco-centre, la Dune du Bouctouche, 2 recs.
2	Downes, C. 1998-2000. Breeding Bird Survey Data. Canadian Wildlife Service, Ottawa, 111 recs.
2	Gagnon, J. 2003. Prince Edward Island plant records. Societe de la faune et des parcs Quebec, 13 recs.
2	Godbout, V. 2001. Recherche de l'Aster du St-Laurent (<i>Symphytotrichum laurentianum</i>) dans les marais sales du sud-est du Nouveau-Brunswick. Irving Eco-centre, la Dune du Bouctouche, 23 pp.
2	Hicklin, P.W. 1998. The Maritime Shorebird Survey Newsletter. Calidris, No. 6. 4 recs.
2	Madden, A. 1998. Wood Turtle records in northern NB. New Brunswick Dept of Natural Resources & Energy, Campbellton, Pers. comm. to S.H. Gerriets. 16 recs.
2	Mills, E. Connell Herbarium Specimens, 1957-2009. University New Brunswick, Fredericton. 2012.
2	Newell, R.E. 2000. E.C. Smith Herbarium Database. Acadia University, Wolfville NS, 7139 recs.
2	Toner, M. 2001. Lynx Records 1973-2000. NB Dept of Natural Resources, 29 recs.
1	Blaney, C.S. Miscellaneous specimens received by ACCDC (botany). Various persons. 2001-08.
1	Boyne, A.W. & Grecian, V.D. 1999. Tern Surveys. Canadian Wildlife Service, Sackville, unpublished data. 23 recs.
1	Boyne, A.W. 2001. Portage Island National Wildlife Area inspection visit. Canadian Wildlife Service, Sackville, 1 rec.
1	Christie, D.S. 2000. Christmas Bird Count Data, 1997-2000. Nature NB, 54 recs.
1	Clayden, S.R. 2012. NBM Science Collections databases: vascular plants. New Brunswick Museum, Saint John NB, 57 recs.
1	Cronin, P. & Ayer, C.; Dubee, B.; Hooper, W.C.; LeBlanc, E.; Madden, A.; Pettigrew, T.; Seymour, P. 1998. Fish Species Management Plans (draft). NB DNRE Internal Report. Fredericton, 164pp.
1	Curley, F.R. Two rare aquatic plant specimens collected by F.R. Curley in PEI and given to D.M. Mazerolle. retired provincial biologist. 2015.
1	Doucet, D.A. 2007. Fieldwork 2007: Insects (minus Odonata). ACCDC Staff, 1 rec.
1	Douglas, S.G. & G.C. Chaput & R. Bradford. 2001. Status of Striped Bass (<i>Morone saxatilis</i>) in the southern Gulf of St. Lawrence in 1999 & 2000. DFO Canadian Science Advisory Secretariat Res. Doc. 2001/058, 2001/058. 1 rec.
1	Elderkin, M. 2001. Bog Lemming record for Popple Depot NB. , Pers. comm. to K.A. Bredin. 1 rec.
1	Glen, W. 1991. 1991 Prince Edward Island Forest Biomass Inventory Data. PEI Dept of Energy and Forestry, 10059 recs.
1	Goltz, J.P. 2007. Field Notes: <i>Listera australis</i> at Kouchibouguac National Park. , 7 recs.
1	Harding, R.W. 2008. Harding Personal Insect Collection 1999-2007. R.W. Harding, 309 recs.
1	Hinds, H.R. 2000. Flora of New Brunswick (2nd Ed.). University New Brunswick, 694 pp.
1	Klymko, J.J.D. 2011. Insect fieldwork & submissions, 2010. Atlantic Canada Conservation Data Centre. Sackville NB, 742 recs.
1	Klymko, J.J.D. 2012. Insect field work & submissions. Atlantic Canada Conservation Data Centre, 852 recs.
1	Klymko, J.J.D. 2012. Insect fieldwork & submissions, 2011. Atlantic Canada Conservation Data Centre. Sackville NB, 760 recs.
1	Klymko, J.J.D. 2012. Odonata specimens & observations, 2010. Atlantic Canada Conservation Data Centre, 425 recs.
1	Mackinnon, C.M. 2000. Inspection visit to Inkerman MBS, June 5, 2000. Canadian Wildlife Service, Sackville, 1 rec.
1	Munro, Marian K. Nova Scotia Provincial Museum of Natural History Herbarium Database. Nova Scotia Provincial Museum of Natural History, Halifax, Nova Scotia. 2014.
1	Saunders, J. 2009. White-Fringe Orchis photo and coordinates. Pers. comm. to S. Blaney, July 17. 1 rec, 1 rec.
1	Toner, M. 2009. Wood Turtle Sightings. NB Dept of Natural Resources. Pers. comm. to S. Gerriets, Jul 13 & Sep 2, 2 recs.
1	Tremblay, E., Craik, S.R., Titman, R.D., Rousseau, A. & Richardson, M.J. 2006. First Report of Black Terns Breeding on a Coastal Barrier Island. Wilson Journal of Ornithology, 118(1):104-106. 1 rec.
1	Young, A.D., Titman, R.D. 1986. Costs and benefits to Red-breasted Mergansers nesting in tern and gull colonies. Can. J. Zool., 64: 2339-2343.

ENVIRONMENTAL IMPACT ASSESSMENT (EIA) REGISTRATION FOR THE MODERNIZATION OF ELECTRICAL TRANSMISSION INFRASTRUCTURE NEAR NEGUAC, NEW BRUNSWICK

December 22, 2017

Table D.1 Plant Species Found in the PDA

Common Name	Scientific Name	AC CDC General Status Rank	CESCC General Status Rank
balsam fir	<i>Abies balsamea</i>	S5	Secure
striped maple	<i>Acer pensylvanicum</i>	S5	Secure
red maple	<i>Acer rubrum</i>	S5	Secure
sugar maple	<i>Acer saccharum</i>	S5	Secure
mountain maple	<i>Acer spicatum</i>	S5	Secure
common yarrow	<i>Achillea millefolium</i>	S5	Secure
colonial bent grass	<i>Agrostis capillaris</i>	SNA	Exotic
upland bent grass	<i>Agrostis perennans</i>	S5	Secure
rough bent grass	<i>Agrostis scabra</i>	S5	Secure
creeping bent grass	<i>Agrostis stolonifera</i>	S5	Secure
northern water plantain	<i>Alisma triviale</i>	S5	Secure
speckled alder	<i>Alnus incana</i>	S5	Secure
green alder	<i>Alnus viridis</i>	S5	Secure
Bartram's serviceberry	<i>Amelanchier bartramiana</i>	S5	Secure
running serviceberry	<i>Amelanchier X neglecta</i>	SNA	Not Assessed
pearly everlasting	<i>Anaphalis margaritacea</i>	S5	Secure
purple-stemmed angelica	<i>Angelica atropurpurea</i>	S4S5	Secure
Howell's pussytoes	<i>Antennaria howellii ssp. neodioica</i>	S5	Secure
large sweet vernal grass	<i>Anthoxanthum odoratum</i>	SNA	Exotic
spreading dogbane	<i>Apocynum androsaemifolium</i>	S5	Secure
bristly sarsaparilla	<i>Aralia hispida</i>	S5	Secure
wild sarsaparilla	<i>Aralia nudicaulis</i>	S5	Secure
common lady fern	<i>Athyrium filix-femina</i>	S5	Secure
yellow birch	<i>Betula alleghaniensis</i>	S5	Secure
paper birch	<i>Betula papyrifera</i>	S5	Secure
heart-leaved birch	<i>Betula papyrifera var. cordifolia</i>	S5	Secure
gray birch	<i>Betula populifolia</i>	S5	Secure
devil's beggarticks	<i>Bidens frondosa</i>	S5	Secure
fringed brome	<i>Bromus ciliatus</i>	S5	Secure
smooth brome	<i>Bromus inermis</i>	SNA	Exotic
bluejoint reed grass	<i>Calamagrostis canadensis</i>	S5	Secure
Pickering's reed grass	<i>CALAMAGROSTIS PICKERINGII</i>	S3	Secure
yellow marsh marigold	<i>Caltha palustris</i>	S4S5	Secure
Pennsylvania bittercress	<i>Cardamine pensylvanica</i>	S5	Secure
black sedge	<i>Carex arctata</i>	S5	Secure
brownish sedge	<i>Carex brunnescens</i>	S5	Secure

ENVIRONMENTAL IMPACT ASSESSMENT (EIA) REGISTRATION FOR THE MODERNIZATION OF ELECTRICAL TRANSMISSION INFRASTRUCTURE NEAR NEGUAC, NEW BRUNSWICK

December 22, 2017

Table D.1 Plant Species Found in the PDA

Common Name	Scientific Name	AC CDC General Status Rank	CESCC General Status Rank
silvery sedge	<i>Carex canescens</i>	S5	Secure
fibrous-root sedge	<i>Carex communis</i>	S5	Secure
Crawford's sedge	<i>Carex crawfordii</i>	S5	Secure
white-edged sedge	<i>Carex debilis</i>	S5	Secure
two-seeded sedge	<i>Carex disperma</i>	S5	Secure
star sedge	<i>Carex echinata</i>	S5	Secure
graceful sedge	<i>Carex gracillima</i>	S5	Secure
nodding sedge	<i>Carex gynandra</i>	S5	Secure
bladder sedge	<i>Carex intumescens</i>	S5	Secure
finely-nerved sedge	<i>Carex leptonevia</i>	S5	Secure
boreal bog sedge	<i>Carex magellanica</i>	S5	Secure
New England sedge	<i>Carex novae-angliae</i>	S5	Secure
pale sedge	<i>Carex pallescens</i>	S5	Secure
few-flowered sedge	<i>Carex pauciflora</i>	S4S5	Secure
necklace sedge	<i>Carex projecta</i>	S5	Secure
retorse sedge	<i>Carex retrorsa</i>	S4	Secure
broom sedge	<i>Carex scoparia</i>	S5	Secure
awl-fruited sedge	<i>Carex stipata</i>	S5	Secure
tussock sedge	<i>Carex stricta</i>	S5	Secure
blunt broom sedge	<i>Carex tribuloides</i>	S4S5	Secure
three-seeded sedge	<i>Carex trisperma</i>	S5	Secure
fox sedge	<i>Carex vulpinoidea</i>	S4S5	Secure
Wiegand's sedge	CAREX WIEGANDII	S3	Secure
common chickweed	<i>Cerastium fontanum</i>	SNA	Exotic
leatherleaf	<i>Chamaedaphne calyculata</i>	S5	Secure
fireweed	<i>Chamerion angustifolium</i>	S5	Secure
white turtlehead	<i>Chelone glabra</i>	S5	Secure
common pipsissewa	<i>Chimaphila umbellata</i>	S5	Secure
American golden saxifrage	<i>Chrysosplenium americanum</i>	S5	Secure
spotted water-hemlock	<i>Cicuta maculata</i>	S5	Secure
drooping wood reed grass	<i>Cinna latifolia</i>	S5	Secure
small enchanter's nightshade	<i>Circaea alpina</i>	S5	Secure
swamp thistle	<i>Cirsium muticum</i>	S5	Secure
Virginia clematis	<i>Clematis virginiana</i>	S5	Secure
yellow bluebead lily	<i>Clintonia borealis</i>	S5	Secure
sweet-fern	<i>Comptonia peregrina</i>	S5	Secure

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Table D.1 Plant Species Found in the PDA

Common Name	Scientific Name	AC CDC General Status Rank	CESCC General Status Rank
goldthread	<i>Coptis trifolia</i>	S5	Secure
alternate-leaved dogwood	<i>Cornus alternifolia</i>	S5	Secure
bunchberry	<i>Cornus canadensis</i>	S5	Secure
red osier dogwood	<i>Cornus sericea</i>	S5	Secure
beaked hazel	<i>Corylus cornuta</i>	S5	Secure
pink lady's-slipper	<i>Cypripedium acaule</i>	S5	Secure
dewdrop	<i>Dalibarda repens</i>	S5	Secure
poverty oat grass	<i>Danthonia spicata</i>	S5	Secure
eastern hay-scented fern	<i>Dennstaedtia punctilobula</i>	S5	Secure
woolly panic grass	<i>Dichanthelium acuminatum</i>	S5	Secure
northern panic grass	<i>Dichanthelium boreale</i>	S5	Secure
northern bush honeysuckle	<i>Diervilla lonicera</i>	S5	Secure
hairy flat-top white aster	<i>Doellingeria umbellata</i>	S5	Secure
round-leaved sundew	<i>Drosera rotundifolia</i>	S5	Secure
spinulose wood fern	<i>Dryopteris carthusiana</i>	S5	Secure
crested wood fern	<i>Dryopteris cristata</i>	S5	Secure
evergreen wood fern	<i>Dryopteris intermedia</i>	S5	Secure
needle spikerush	<i>Eleocharis acicularis</i>	S5	Secure
ovate spikerush	<i>Eleocharis ovata</i>	S5	Secure
trailing arbutus	<i>Epigaea repens</i>	S5	Secure
northern willowherb	<i>Epilobium ciliatum</i>	S5	Secure
bog willowherb	<i>Epilobium leptophyllum</i>	S5	Secure
marsh willowherb	<i>Epilobium palustre</i>	S5	Secure
helleborine	<i>Epipactis helleborine</i>	SNA	Exotic
field horsetail	<i>Equisetum arvense</i>	S5	Secure
woodland horsetail	<i>Equisetum sylvaticum</i>	S5	Secure
narrow-leaved cottongrass	<i>Eriophorum angustifolium</i>	S5	Secure
russet cottongrass	<i>Eriophorum russeolum</i>	S3S4	Secure
tussock cottongrass	<i>Eriophorum vaginatum</i>	S5	Secure
tawny cottongrass	<i>Eriophorum virginicum</i>	S5	Secure
spotted joe-pye-weed	<i>Eupatorium maculatum</i>	S5	Secure
common boneset	<i>Eupatorium perfoliatum</i>	S5	Secure
stiff eyebright	<i>Euphrasia stricta</i>	SNA	Exotic
large-leaved aster	<i>Eurybia macrophylla</i>	S5	Secure
grass-leaved goldenrod	<i>Euthamia graminifolia</i>	S5	Secure
American beech	<i>Fagus grandifolia</i>	S4	Secure

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Table D.1 Plant Species Found in the PDA

Common Name	Scientific Name	AC CDC General Status Rank	CESCC General Status Rank
red fescue	<i>Festuca rubra</i>	S5	Secure
wild strawberry	<i>Fragaria virginiana</i>	S5	Secure
white ash	<i>Fraxinus americana</i>	S4S5	Secure
black ash	<i>Fraxinus nigra</i>	S4S5	Secure
common hemp-nettle	<i>Galeopsis tetrahit</i>	SNA	Exotic
common bedstraw	<i>Galium aparine</i>	SU	Exotic
rough bedstraw	<i>Galium asprellum</i>	S5	Secure
common marsh bedstraw	<i>Galium palustre</i>	S5	Secure
three-flowered bedstraw	<i>Galium triflorum</i>	S5	Secure
creeping snowberry	<i>Gaultheria hispidula</i>	S5	Secure
eastern teaberry	<i>Gaultheria procumbens</i>	S5	Secure
black huckleberry	<i>Gaylussacia baccata</i>	S5	Secure
yellow avens	<i>Geum aleppicum</i>	S5	Secure
rough avens	<i>Geum laciniatum</i>	S5	Secure
water avens	<i>Geum rivale</i>	S5	Secure
northern manna grass	<i>Glyceria borealis</i>	S5	Secure
Canada manna grass	<i>Glyceria canadensis</i>	S5	Secure
common tall manna grass	<i>Glyceria grandis</i>	S5	Secure
slender manna grass	<i>Glyceria melicaria</i>	S5	Secure
fowl manna grass	<i>Glyceria striata</i>	S5	Secure
marsh cudweed	<i>Gnaphalium uliginosum</i>	SNA	Exotic
common oak fern	<i>Gymnocarpium dryopteris</i>	S5	Secure
common cow parsnip	<i>Heracleum maximum</i>	S5	Secure
orange hawkweed	<i>Hieracium aurantiacum</i>	SNA	Exotic
field hawkweed	<i>Hieracium caespitosum</i>	SNA	Exotic
canada hawkweed	<i>Hieracium canadense</i>	S5	Secure
mouse-ear hawkweed	<i>Hieracium pilosella</i>	SNA	Exotic
tall hawkweed	<i>Hieracium piloselloides</i>	SNA	Exotic
rough hawkweed	<i>Hieracium scabrum</i>	S5	Secure
shining firmoss	<i>Huperzia lucidula</i>	S5	Secure
northern st john's-wort	<i>Hypericum boreale</i>	S5	Secure
Canada st john's-wort	<i>Hypericum canadense</i>	S5	Secure
pale st john's-wort	<i>Hypericum ellipticum</i>	S5	Secure
common st john's-wort	<i>Hypericum perforatum</i>	SNA	Exotic
common winterberry	<i>Ilex verticillata</i>	S5	Secure
spotted jewelweed	<i>Impatiens capensis</i>	S5	Secure

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Table D.1 Plant Species Found in the PDA

Common Name	Scientific Name	AC CDC General Status Rank	CESCC General Status Rank
harlequin blue flag	<i>Iris versicolor</i>	S5	Secure
jointed rush	<i>Juncus articulatus</i>	S5	Secure
narrow-panicked rush	<i>Juncus brevicaudatus</i>	S5	Secure
Canada rush	<i>Juncus canadensis</i>	S5	Secure
soft rush	<i>Juncus effusus</i>	S5	Secure
thread rush	<i>Juncus filiformis</i>	S5	Secure
slender rush	<i>Juncus tenuis</i>	S5	Secure
sheep laurel	<i>Kalmia angustifolia</i>	S5	Secure
pale bog laurel	<i>Kalmia polifolia</i>	S5	Secure
tall blue lettuce	<i>Lactuca biennis</i>	S5	Secure
tamarack	<i>Larix laricina</i>	S5	Secure
common labrador tea	<i>Ledum groenlandicum</i>	S5	Secure
rice cut grass	<i>Leersia oryzoides</i>	S5	Secure
turion duckweed	<i>Lemna turionifera</i>	S5	Secure
fall dandelion	<i>Leontodon autumnalis</i>	SNA	Exotic
oxeye daisy	<i>Leucanthemum vulgare</i>	SNA	Exotic
twinfleur	<i>Linnaea borealis</i>	S5	Secure
Canada fly honeysuckle	<i>Lonicera canadensis</i>	S5	Secure
mountain fly honeysuckle	<i>Lonicera villosa</i>	S5	Secure
marsh seedbox	<i>Ludwigia palustris</i>	S4	Secure
common woodrush	<i>Luzula multiflora</i>	S5	Secure
small-flowered woodrush	<i>Luzula parviflora</i>	S4	Secure
stiff clubmoss	<i>Lycopodium annotinum</i>	S5	Secure
running clubmoss	<i>Lycopodium clavatum</i>	S5	Secure
round-branched tree-clubmoss	<i>Lycopodium dendroideum</i>	S5	Secure
hickey's tree-clubmoss	<i>Lycopodium hickeyi</i>	S4	Secure
flat-branched tree-clubmoss	<i>Lycopodium obscurum</i>	S5	Secure
blue groundcedar	<i>Lycopodium tristachyum</i>	S4S5	Secure
American water horehound	<i>Lycopus americanus</i>	S5	Secure
northern water horehound	<i>Lycopus uniflorus</i>	S5	Secure
fringed yellow loosestrife	<i>Lysimachia ciliata</i>	S5	Secure
swamp yellow loosestrife	<i>Lysimachia terrestris</i>	S5	Secure
wild lily-of-the-valley	<i>Maianthemum canadense</i>	S5	Secure
large false solomon's seal	<i>Maianthemum racemosum</i>	S5	Secure
three-leaved false soloman's seal	<i>Maianthemum trifolium</i>	S5	Secure

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Table D.1 Plant Species Found in the PDA

Common Name	Scientific Name	AC CDC General Status Rank	CESCC General Status Rank
musk mallow	<i>Malva moschata</i>	SNA	Exotic
pineapple weed	<i>Matricaria discoidea</i>	SNA	Exotic
ostrich fern	<i>Matteuccia struthiopteris</i>	S5	Secure
indian cucumber root	<i>Medeola virginiana</i>	S5	Secure
American cow wheat	<i>Melampyrum lineare</i>	S5	Secure
partridgeberry	<i>Mitchella repens</i>	S5	Secure
naked bishop's-cap	<i>Mitella nuda</i>	S5	Secure
one-flowered wintergreen	<i>Moneses uniflora</i>	S5	Secure
piresap	<i>Monotropa hypopithys</i>	S4	Secure
indian pipe	<i>Monotropa uniflora</i>	S5	Secure
northern bayberry	<i>Morella pensylvanica</i>	S5	Secure
small forget-me-not	<i>Myosotis laxa</i>	S5	Secure
mountain holly	<i>Nemopanthus mucronatus</i>	S5	Secure
whorled wood aster	<i>Oclemena acuminata</i>	S5	Secure
woodland cudweed	<i>Omalotheca sylvatica</i>	S4S5	Secure
sensitive fern	<i>Onoclea sensibilis</i>	S5	Secure
one-sided wintergreen	<i>Orthilia secunda</i>	S5	Secure
white-grained mountain rice	<i>Oryzopsis asperifolia</i>	S5	Secure
cinnamon fern	<i>Osmunda cinnamomea</i>	S5	Secure
interrupted fern	<i>Osmunda claytoniana</i>	S5	Secure
royal fern	<i>Osmunda regalis</i>	S5	Secure
common wood sorrel	<i>Oxalis montana</i>	S5	Secure
northern sweet coltsfoot	<i>Petasites frigidus</i>	S4S5	Secure
reed canary grass	<i>Phalaris arundinacea</i>	S5	Secure
northern beech fern	<i>Phegopteris connectilis</i>	S5	Secure
common timothy	<i>Phleum pratense</i>	SNA	Exotic
white spruce	<i>Picea glauca</i>	S5	Secure
black spruce	<i>Picea mariana</i>	S5	Secure
red spruce	<i>Picea rubens</i>	S5	Secure
jack pine	<i>Pinus banksiana</i>	S5	Secure
eastern white pine	<i>Pinus strobus</i>	S5	Secure
white fringed orchid	PLATANATHERA BLEPHARIGLOTTIS	S3	Secure
club spur orchid	<i>Platanthera clavellata</i>	S4S5	Secure
ragged fringed orchid	<i>Platanthera lacera</i>	S4	Secure
small round-leaved orchid	<i>Platanthera orbiculata</i>	S4	Secure
fowl blue grass	<i>Poa palustris</i>	S5	Secure

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Table D.1 Plant Species Found in the PDA

Common Name	Scientific Name	AC CDC General Status Rank	CESCC General Status Rank
rose pogonia	<i>Pogonia ophioglossoides</i>	S4	Secure
fringed black bindweed	<i>Polygonum cilinode</i>	S5	Secure
spotted lady's-thumb	<i>Polygonum persicaria</i>	SNA	Exotic
arrow-leaved smartweed	<i>Polygonum sagittatum</i>	S5	Secure
large-toothed aspen	<i>Populus grandidentata</i>	S5	Secure
trembling aspen	<i>Populus tremuloides</i>	S5	Secure
rough cinquefoil	<i>Potentilla norvegica</i>	S5	Secure
old field cinquefoil	<i>Potentilla simplex</i>	S5	Secure
tall rattlesnakeroot	<i>Prenanthes altissima</i>	S5	Secure
three-leaved rattlesnakeroot	<i>Prenanthes trifoliolata</i>	S5	Secure
common self-heal	<i>Prunella vulgaris</i>	S5	Secure
pin cherry	<i>Prunus pensylvanica</i>	S5	Secure
chokecherry	<i>Prunus virginiana</i>	S5	Secure
bracken fern	<i>Pteridium aquilinum</i>	S5	Secure
pink pyrola	<i>Pyrola asarifolia</i>	S5	Secure
shinleaf	<i>Pyrola elliptica</i>	S5	Secure
northern red oak	<i>Quercus rubra</i>	S5	Secure
common buttercup	<i>Ranunculus acris</i>	SNA	Exotic
white water buttercup	<i>Ranunculus aquatilis</i>	SNA	Secure
lesser spearwort	<i>Ranunculus flammula</i>	S5	Secure
bristly buttercup	<i>Ranunculus hispidus</i>	S4S5	Secure
creeping buttercup	<i>Ranunculus repens</i>	SNA	Exotic
rhodora	<i>Rhododendron canadense</i>	S5	Secure
white beakrush	<i>Rhynchospora alba</i>	S5	Secure
skunk currant	<i>Ribes glandulosum</i>	S5	Secure
bristly black currant	<i>Ribes lacustre</i>	S5	Secure
swamp red currant	<i>Ribes triste</i>	S5	Secure
shining rose	<i>Rosa nitida</i>	S5	Secure
Virginia rose	<i>Rosa virginiana</i>	S5	Secure
alleganey blackberry	<i>Rubus allegheniensis</i>	S5	Secure
smooth blackberry	<i>Rubus canadensis</i>	S5	Secure
red raspberry	<i>Rubus idaeus</i>	S5	Secure
dwarf red raspberry	<i>Rubus pubescens</i>	S5	Secure
sheep sorrel	<i>Rumex acetosella</i>	SNA	Exotic
greater water dock	<i>Rumex orbiculatus</i>	S5	Secure
broad-leaved arrowhead	<i>Sagittaria latifolia</i>	S5	Secure

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Table D.1 Plant Species Found in the PDA

Common Name	Scientific Name	AC CDC General Status Rank	CESCC General Status Rank
Bebb's willow	<i>Salix bebbiana</i>	S5	Secure
pussy willow	<i>Salix discolor</i>	S5	Secure
cottony willow	<i>Salix eriocephala</i>	S5	Secure
balsam willow	<i>Salix pyrifolia</i>	S5	Secure
black elderberry	<i>Sambucus nigra</i>	S5	Secure
red elderberry	<i>Sambucus racemosa</i>	S5	Secure
northern pitcher plant	<i>Sarracenia purpurea</i>	S5	Secure
purple oat grass	<i>Schizachne purpurascens</i>	S4S5	Secure
black-girdled bulrush	<i>Scirpus atrocinctus</i>	S5	Secure
common woolly bulrush	<i>Scirpus cyperinus</i>	S5	Secure
mosquito bulrush	<i>Scirpus hattorianus</i>	S5	Secure
small-fruited bulrush	<i>Scirpus microcarpus</i>	S5	Secure
marsh skullcap	<i>Scutellaria galericulata</i>	S5	Secure
mad-dog skullcap	<i>Scutellaria lateriflora</i>	S5	Secure
three-toothed cinquefoil	<i>Sibbaldiopsis tridentata</i>	S5	Secure
mountain blue-eyed-grass	<i>Sisyrinchium montanum</i>	S5	Secure
Canada goldenrod	<i>Solidago canadensis</i>	S5	Secure
early goldenrod	<i>Solidago juncea</i>	S5	Secure
large-leaved goldenrod	<i>Solidago macrophylla</i>	S4	Secure
downy goldenrod	<i>Solidago puberula</i>	S5	Secure
rough-stemmed goldenrod	<i>Solidago rugosa</i>	S5	Secure
northern bog goldenrod	<i>Solidago uliginosa</i>	S5	Secure
American mountain ash	<i>Sorbus americana</i>	S5	Secure
American burreed	<i>Sparganium americanum</i>	S5	Secure
narrow-leaved burreed	<i>Sparganium angustifolium</i>	S5	Secure
ruby sandspurrey	<i>Spergularia rubra</i>	SNA	Exotic
white meadowsweet	<i>Spiraea alba</i>	S5	Secure
steeplebush	<i>Spiraea tomentosa</i>	S5	Secure
slender ladies'-tresses	<i>Spiranthes lacera</i>	S5	Secure
rose twisted-stalk	<i>Streptopus lanceolatus</i>	S5	Secure
heart-leaved aster	<i>Symphyotrichum cordifolium</i>	S5	Secure
calico aster	<i>Symphyotrichum lateriflorum</i>	S5	Secure
New York aster	<i>Symphyotrichum novi-belgii</i>	S5	Secure
purple-stemmed aster	<i>Symphyotrichum puniceum</i>	S5	Secure
common tansy	<i>Tanacetum vulgare</i>	SNA	Exotic
Canada yew	<i>Taxus canadensis</i>	S5	Secure

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Table D.1 Plant Species Found in the PDA

Common Name	Scientific Name	AC CDC General Status Rank	CESCC General Status Rank
tall meadow-rue	<i>Thalictrum pubescens</i>	S5	Secure
New York fern	<i>Thelypteris noveboracensis</i>	S5	Secure
eastern white cedar	<i>Thuja occidentalis</i>	S5	Secure
pale false manna grass	<i>Torreyochloa pallida</i>	S5	Secure
northern poison oak	<i>Toxicodendron rydbergii</i>	S5	Secure
Fraser's marsh st john's-wort	<i>Triadenum fraseri</i>	S5	Secure
northern starflower	<i>Trientalis borealis</i>	S5	Secure
low hop clover	<i>Trifolium campestre</i>	SNA	Exotic
white clover	<i>Trifolium repens</i>	SNA	Exotic
nodding trillium	<i>Trillium cernuum</i>	S5	Secure
painted trillium	<i>Trillium undulatum</i>	S5	Secure
eastern hemlock	<i>Tsuga canadensis</i>	S5	Secure
coltsfoot	<i>Tussilago farfara</i>	SNA	Exotic
broad-leaved cattail	<i>Typha latifolia</i>	S5	Secure
stinging nettle	<i>Urtica dioica</i>	S4	Secure
late lowbush blueberry	<i>Vaccinium angustifolium</i>	S5	Secure
large cranberry	<i>Vaccinium macrocarpon</i>	S5	Secure
velvet-leaved blueberry	<i>Vaccinium myrtilloides</i>	S5	Secure
small cranberry	<i>Vaccinium oxycoccos</i>	S5	Secure
American speedwell	<i>Veronica americana</i>	S5	Secure
hobblebush	<i>Viburnum lantanoides</i>	S5	Secure
northern wild raisin	<i>Viburnum nudum</i>	S5	Secure
highbush cranberry	<i>Viburnum opulus</i>	S4	Secure
marsh blue violet	<i>Viola cucullata</i>	S5	Secure
small white violet	<i>Viola macloskeyi</i>	S5	Secure

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Table D.2 Wetland Descriptions and Functional Attributes for Wetlands crossed by the New Line Construction PDA and the Line 0104 to be Decommissioned PDA (Neguac NB).

Wetland Number	Wetland Categories																													
	Large Complexes					Headwater Riparian						Riparian			Basin						RoW									
	3	5	15	17	20	8	9	12	13	19	26	14	25	29	1	2	6	10	18	21	22	28	4	7	11	16	23	24	27	
Wetland Types Present in the LAA																														
Bog	x	x			x																									
Fen		x																												
Treed Bog	x	x	x	x	x										x									x						
ConiferousTreed Swamp	x	x	x	x	x					x		x	x		x	x	x													
Mixedwood Treed Swamp		x	x	x	x	x	x		x	x	x		x	x			x	x												
Deciduous Treed Swamp		x	x	x	x			x						x					x	x										
Tall Shrub Swamp		x	x	x	x						x	x	x	x																
Low Shrub Swamp																											x			
Freshwater Marsh		x	x	x	x	x	x	x	x		x			x			x							x	x		x	x	x	
Shallow-water Wetland	x				x																									
Wetland Types Present in the New PDA																														
Bog	x																													
Fen																														
Treed Bog	x	x														x														
ConiferousTreed Swamp	x	x	x	x	x							x			x															
Mixedwood Treed Swamp		x	x		x	x			x	x	x						x	x												
Deciduous Treed Swamp		x		x	x														x	x										
Tall Shrub Swamp		x			x							x	x	x																
Low Shrub Swamp																														
Freshwater Marsh	x		x		x		x				x						x								x					
Shallow-water Wetland	x				x																									
Wetland Types Present in the Existing Transmission Line RoW																														
Bog		x																												
Fen																														
Treed Bog	x	x														x								x						
ConiferousTreed Swamp	x											x																		
Mixedwood Treed Swamp																														
Deciduous Treed Swamp																														
Tall Shrub Swamp		x	x									x	x	x																
Low Shrub Swamp																											x			
Freshwater Marsh	x	x	x	x	x	x	x	x	x	x	x			x			x							x	x		x	x	x	
Shallow-water Wetland					x																									
Wetland Functions																														

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Table D.2 Wetland Descriptions and Functional Attributes for Wetlands crossed by the New Line Construction PDA and the Line 0104 to be Decommissioned PDA (Neguac NB).

Wetland Number	Wetland Categories																													
	Large Complexes					Headwater Riparian						Riparian			Basin							RoW								
	3	5	15	17	20	8	9	12	13	19	26	14	25	29	1	2	6	10	18	21	22	28	4	7	11	16	23	24	27	
Terrestrial bird habitat	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x				x				
Terrestrial mammal habitat	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	
Waterbird and Waterfowl Habitat			x	x	x																									
Semi-aquatic Mammal Habitat		x	x	x	x							x	x	x																
Amphibian Breeding Habitat	x	x	x	x	x	x	x		x	x	x	x	x	x			x				x	x		x		x	x	x	x	
Fish habitat		x	x	x	x							x	x	x																
Aquatic Invertebrate Habitat	x	x	x	x	x	x	x	x	x	x	x	x	x	x			x	x	x		x	x		x		x	x	x	x	
Habitat for Species at Risk		x	x				x				x																			
Habitat for Species of Conservation Concern	x	x														x						x	x							
Carbon Sequestration	x	x	x	x	x											x							x							
Stream Flow Regulation	x	x	x	x	x	x	x	x	x	x	x	x	x	x																
Stream Cooling		x	x	x	x	x			x			x	x	x																
Flood Amelioration		x	x	x	x				x			x	x	x																
Water Quality Improvement					x						x			x							x	x					x	x	x	

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Common Name	Scientific Name	COSEWIC	NB Provincial Rank	AC CDC S-Rank	General Status Rank	Sources
common loon	<i>Gavia immer</i>	Not at Risk		S4B,S4M,S4N	Secure	NA BBS
northern gannet	<i>Morus bassanus</i>			SHB,S5M	Secure	AC CDC
double-crested cormorant	<i>Phalacrocorax auritus</i>	Not at Risk		S5B,S5M	Secure	MBBA, NA BBS
American bittern	<i>Botaurus lentiginosus</i>			S4B,S4S5M	Secure	MBBA, NA BBS
great blue heron	<i>Ardea herodias</i>			S4B,S4M	Secure	MBBA, NA BBS
brant	<i>Branta bernicla</i>			S1N, S2S3M	Secure	AC CDC
Canada goose	<i>Branta canadensis</i>			SNAB,S5M	Secure	Field, MBBA
wood duck	<i>Aix sponsa</i>			S4B,S4M	Secure	Field, MBBA, NA BBS
green-winged teal	<i>Anas crecca</i>			S4B,S5M	Secure	MBBA, NA BBS
American black duck	<i>Anas rubripes</i>			S5B,S4N,S5M	Secure	MBBA, NA BBS
mallard	<i>Anas platyrhynchos</i>			S5B,S4N,S5M	Secure	Field, MBBA
northern pintail	<i>Anas acuta</i>			S3B,S5M	Sensitive	AC CDC, MBBA
blue-winged teal	<i>Anas discors</i>			S4B,S4M	Secure	MBBA, NA BBS
northern shoveler	<i>Anas clypeata</i>			S2S3B,S2S3M	Secure	AC CDC, MBBA
gadwall	<i>Anas strepera</i>			S2B,S3M	Secure	NA BBS
American wigeon	<i>Anas Americana</i>			S4B,S4S5M	Secure	MBBA, NA BBS
ring-necked duck	<i>Aythya collaris</i>			S5B,S5M	Secure	MBBA
greater scaup	<i>Aythya marila</i>			S1B,S4M,S2N	Secure	AC CDC
lesser scaup	<i>Aythya affinis</i>			S1B,S4M	Secure	AC CDC
common eider	<i>Somateria mollissima</i>			S3B,S4M,S3N	Secure	AC CDC
black scoter	<i>Melanitta nigra</i>			S3M,S1S2N	Sensitive	AC CDC
common goldeneye	<i>Bucephala clangula</i>			S4B,S5M,S4N	Secure	NA BBS
Barrow's goldeneye - eastern pop.	<i>Bucephala islandica</i> (Eastern pop.)	Special Concern	Special Concern	S2M,S2N	Sensitive	AC CDC

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bufflehead	<i>Bucephala albeola</i>			S3M,S2N	Sensitive	AC CDC
hooded merganser	<i>Lophodytes cucullatus</i>			S4B,S5M	Secure	Field, MBBA, NA BBS
common merganser	<i>Mergus merganser</i>			S5B,S4N,S5M	Secure	MBBA, NA BBS
red-breasted merganser	<i>Mergus serrator</i>			S3B,S5M,S4S5N	Secure	AC CDC, MBBA
ruddy duck	<i>Oxyura jamaicensis</i>			S1B,S2S3M	Secure	AC CDC
osprey	<i>Pandion haliaetus</i>			S4S5B,S5M	Secure	MBBA, NA BBS
bald eagle	<i>Haliaeetus leucocephalus</i>	Not at Risk	Endangered	S4	At Risk	MBBA, NA BBS
northern harrier	<i>Circus cyaneus</i>	Not at Risk		S4B,S4S5M	Secure	MBBA
sharp-shinned hawk	<i>Accipiter striatus</i>	Not at Risk		S4B,S5M	Secure	MBBA, NA BBS
cooper's hawk	<i>Accipiter cooperii</i>	Not at Risk		S1S2B,S1S2M	May Be At Risk	NA BBS
northern goshawk	<i>Accipiter gentilis</i>	Not at Risk		S4	Secure	Field
broad-winged hawk	<i>Buteo platypterus</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
red-tailed hawk	<i>Buteo jamaicensis</i>	Not at Risk		S4	Secure	Field, MBBA
American kestrel	<i>Falco sparverius</i>			S4B,S4S5M	Secure	Field, MBBA
merlin	<i>Falco columbarius</i>	Not at Risk		S5B,S5M	Secure	MBBA, NA BBS
spruce grouse	<i>Falcapennis canadensis</i>			S5	Secure	Field, MBBA
ruffed grouse	<i>Bonasa umbellus</i>			S5	Secure	Field, MBBA, NA BBS
sora	<i>Porzana carolina</i>			S4B,S4M	Secure	MBBA
black-bellied plover	<i>Pluvialis squatarola</i>			S3S4M	Secure	AC CDC
American golden-plover	<i>Pluvialis dominica</i>			S2S3M	Sensitive	AC CDC
piping plover melodus ssp	<i>Charadrius melodus melodus</i>	Endangered	Endangered	S1B,S1M	At Risk	AC CDC, MBBA

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Common Name	Scientific Name	COSEWIC	NB Provincial Rank	AC CDC S-Rank	General Status Rank	Sources
killdeer	<i>Charadrius vociferus</i>			S3B,S3M	Sensitive	AC CDC, MBBA, NA BBS
greater yellowlegs	<i>Tringa melanoleuca</i>			S1?B,S5M	Secure	AC CDC
willet	<i>Tringa semipalmata</i>			S3B,S3M	Sensitive	AC CDC, MBBA
spotted sandpiper	<i>Actitis macularius</i>			S3S4B,S5M	Secure	AC CDC, MBBA, NA BBS
ruddy turnstone	<i>Arenaria interpres</i>			S3M	Secure	AC CDC
red knot rufa ssp	<i>Calidris canutus rufa</i>	Endangered	Endangered	S2M	At Risk	AC CDC
semipalmated sandpiper	<i>Calidris pusilla</i>			S3S4M	Secure	AC CDC
Baird's sandpiper	<i>Calidris bairdii</i>			S1S2M	Sensitive	AC CDC
pectoral sandpiper	<i>Calidris melanotos</i>			S3S4M	Secure	AC CDC
Wilson's snipe	<i>Gallinago delicata</i>			S3S4B,S5M	Secure	AC CDC, Field, NA BBS
American woodcock	<i>Scolopax minor</i>			S5B,S5M	Secure	MBBA
ring-billed gull	<i>Larus delawarensis</i>			S3S4B,S5M	Secure	AC CDC, NA BBS
herring gull	<i>Larus argentatus</i>			S5	Secure	MBBA, NA BBS
great black-backed gull	<i>Larus marinus</i>			S5	Secure	MBBA, NA BBS
common tern	<i>Sterna hirundo</i>	Not at Risk		S3B,SUM	Sensitive	AC CDC, MBBA, NA BBS
arctic tern	<i>Sterna paradisaea</i>			S1B,SUM	May Be At Risk	AC CDC
rock pigeon	<i>Columba livia</i>			SNA	Exotic	NA BBS, MBBA
mourning dove	<i>Zenaida macroura</i>			S5B,S5M,S4N	Secure	Field, MBBA, NA BBS
black-billed cuckoo	<i>Coccyzus erythrophthalmus</i>			S3B,S3M	Secure	NA BBS
great horned owl	<i>Bubo virginianus</i>			S4	Secure	MBBA

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Common Name	Scientific Name	COSEWIC	NB Provincial Rank	AC CDC S-Rank	General Status Rank	Sources
barred owl	<i>Strix varia</i>			S5	Secure	MBBA
short-eared owl	<i>Asio flammeus</i>	Special Concern	Special Concern	S2B,S2M	Sensitive	AC CDC
boreal owl	<i>Aegolius funereus</i>	Not at Risk		S1S2B,SUM	May Be At Risk	AC CDC, MBBA
northern saw-whet owl	<i>Aegolius acadicus</i>			S5B,S5M	Secure	MBBA
common nighthawk	<i>Chordeiles minor</i>	Threatened	Threatened	S3B,S4M	At Risk	AC CDC, Field, MBBA
chimney swift	<i>Chaetura pelagica</i>	Threatened	Threatened	S2S3B,S2M	At Risk	AC CDC, NA BBS
ruby-throated hummingbird	<i>Archilochus colubris</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
belted kingfisher	<i>Megaceryle alcyon</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
yellow-bellied sapsucker	<i>Sphyrapicus varius</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
downy woodpecker	<i>Picoides pubescens</i>			S5	Secure	Field, MBBA, NA BBS
hairy woodpecker	<i>Picoides villosus</i>			S5	Secure	Field, MBBA, NA BBS
black-backed woodpecker	<i>Picoides arcticus</i>			S4	Secure	Field, MBBA
American three-toed woodpecker	<i>Picoides dorsalis</i>			S2S3	Sensitive	Field
northern flicker	<i>Colaptes auratus</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
pileated woodpecker	<i>Dryocopus pileatus</i>			S5	Secure	Field, MBBA, NA BBS
olive-sided flycatcher	<i>Contopus cooperi</i>	Threatened	Threatened	S3B,S3M	At Risk	AC CDC, Field, MBBA, NA BBS
eastern wood-pewee	<i>Contopus virens</i>	Special Concern	Special Concern	S4B,S4M	Secure	AC CDC, Field, MBBA, NA BBS
yellow-bellied flycatcher	<i>Empidonax flaviventris</i>			S4S5B,S5M	Secure	Field, MBBA, NA BBS
alder flycatcher	<i>Empidonax alnorum</i>			S5B,S5M	Secure	Field, MBBA, NA BBS

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Table D.3 All species identified in or near the LAA from field surveys, the MBBA, NA BBS or AC CDC.

Common Name	Scientific Name	COSEWIC	NB Provincial Rank	AC CDC S-Rank	General Status Rank	Sources
least flycatcher	<i>Empidonax minimus</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
eastern phoebe	<i>Sayornis phoebe</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
great crested flycatcher	<i>Myiarchus crinitus</i>			S2S3B,S2S3M	Sensitive	AC CDC, MBBA
eastern kingbird	<i>Tyrannus tyrannus</i>			S3S4B,S3S4M	Sensitive	AC CDC, MBBA, NA BBS
horned lark	<i>Eremophila alpestris</i>			S1B,S4N,S5M	May Be At Risk	AC CDC, MBBA
tree swallow	<i>Tachycineta bicolor</i>			S4B,S4M	Secure	Field, MBBA, NA BBS
bank swallow	<i>Riparia riparia</i>	Threatened		S2S3B,S2S3M	Sensitive	AC CDC, MBBA, NA BBS
cliff swallow	<i>Petrochelidon pyrrhonota</i>			S2S3B,S2S3M	Sensitive	AC CDC, MBBA, NA BBS
barn swallow	<i>Hirundo rustica</i>	Threatened	Threatened	S2B,S2M	Sensitive	AC CDC, MBBA, NA BBS
gray jay	<i>Perisoreus canadensis</i>			S4	Secure	Field, MBBA, NA BBS
blue jay	<i>Cyanocitta cristata</i>			S5	Secure	Field, MBBA, NA BBS
American crow	<i>Corvus brachyrhynchos</i>			S5	Secure	Field, MBBA, NA BBS
common raven	<i>Corvus corax</i>			S5	Secure	Field, MBBA, NA BBS
black-capped chickadee	<i>Poecile atricapilla</i>			S5	Secure	Field, MBBA, NA BBS
boreal chickadee	<i>Poecile hudsonica</i>			S4	Secure	Field, MBBA, NA BBS
red-breasted nuthatch	<i>Sitta canadensis</i>			S5	Secure	Field, MBBA, NA BBS
brown creeper	<i>Certhia Americana</i>			S5	Secure	Field, MBBA
winter wren	<i>Troglodytes troglodytes</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
golden-crowned kinglet	<i>Regulus satrapa</i>			S5	Secure	Field, MBBA, NA BBS

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Common Name	Scientific Name	COSEWIC	NB Provincial Rank	AC CDC S-Rank	General Status Rank	Sources
ruby-crowned kinglet	<i>Regulus calendula</i>			S4B,S5M	Secure	Field, MBBA, NA BBS
eastern bluebird	<i>Sialia sialis</i>	Not at Risk		S4B,S4M	Secure	MBBA, NA BBS
veery	<i>Catharus fuscescens</i>			S4B,S4M	Secure	Field, MBBA, NA BBS
Swainson's thrush	<i>Catharus ustulatus</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
hermit thrush	<i>Catharus guttatus</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
wood thrush	<i>Hylocichla mustelina</i>	Threatened	Threatened	S1S2B,S1S2M	May Be At Risk	AC CDC
American robin	<i>Turdus migratorius</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
gray catbird	<i>Dumetella carolinensis</i>			S4B,S4M	Secure	MBBA, NA BBS
northern mockingbird	<i>Mimus polyglottos</i>			S2B,S2M	Sensitive	AC CDC, MBBA
brown thrasher	<i>Toxostoma rufum</i>			S2B,S2M	Sensitive	AC CDC, MBBA
cedar waxwing	<i>Bombycilla cedrorum</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
European starling	<i>Sturnus vulgaris</i>			SNA	Exotic	MBBA, NA BBS
blue-headed vireo	<i>Vireo solitarius</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
warbling vireo	<i>Vireo gilvus</i>			S3B,S3M	Secure	AC CDC, MBBA, NA BBS
red-eyed vireo	<i>Vireo olivaceus</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
Tennessee warbler	<i>Vermivora peregrina</i>			S4B,S5M	Secure	Field, MBBA, NA BBS
Nashville warbler	<i>Vermivora ruficapilla</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
northern parula	<i>Parula Americana</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
yellow warbler	<i>Dendroica petechia</i>			S5B,S5M	Secure	MBBA, NA BBS
chestnut-sided warbler	<i>Dendroica pensylvanica</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
magnolia warbler	<i>Dendroica magnolia</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
cape may warbler	<i>Dendroica tigrina</i>			S3B,S4S5M	Secure	AC CDC, Field, MBBA, NA BBS

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black-throated blue warbler	<i>Dendroica caerulescens</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
yellow-rumped warbler	<i>Dendroica coronata</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
black-throated green warbler	<i>Dendroica virens</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
blackburnian warbler	<i>Dendroica fusca</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
pine warbler	<i>Dendroica pinus</i>			S5B,S5M	Secure	MBBA
palm warbler	<i>Dendroica palmarum</i>			S5B,S5M	Secure	Field, MBBA
bay-breasted warbler	<i>Dendroica castanea</i>			S4B,S4S5M	Secure	Field, MBBA, NA BBS
black-and-white warbler	<i>Mniotilta varia</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
American redstart	<i>Setophaga ruticilla</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
ovenbird	<i>Seiurus aurocapilla</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
northern waterthrush	<i>Seiurus noveboracensis</i>			S4B,S5M	Secure	Field, MBBA, NA BBS
mourning warbler	<i>Oporornis philadelphia</i>			S4B,S5M	Secure	Field, MBBA, NA BBS
common yellowthroat	<i>Geothlypis trichas</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
Wilson's warbler	<i>Wilsonia pusilla</i>			S4B,S5M	Secure	MBBA
Canada warbler	<i>Wilsonia canadensis</i>	Threatened	Threatened	S3B,S3M	At Risk	AC CDC, Field, MBBA, NA BBS
rose-breasted grosbeak	<i>Pheucticus ludovicianus</i>			S4B,S4M	Sensitive	MBBA, NA BBS
indigo bunting	<i>Passerina cyanea</i>			S3B,S3M	Secure	AC CDC
chipping sparrow	<i>Spizella passerina</i>			S5B,S5M	Secure	MBBA, NA BBS
clay-colored sparrow	<i>Spizella pallida</i>			SNA	Accidental	NA BBS
field sparrow	<i>Spizella pusilla</i>			SNA	Undetermined	MBBA, NA BBS
vesper sparrow	<i>Pooecetes gramineus</i>			S2B,S2M	May Be At Risk	AC CDC, MBBA

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savannah sparrow	<i>Passerculus sandwichensis</i>			S4S5B,S5M	Secure	MBBA, NA BBS
Nelson's sparrow	<i>Ammodramus nelsoni</i>	Not at Risk		S4B,S4M	Secure	MBBA
song sparrow	<i>Melospiza melodia</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
Lincoln's sparrow	<i>Melospiza lincolni</i>			S4B,S5M	Secure	Field, MBBA, NA BBS
swamp sparrow	<i>Melospiza georgiana</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
white-throated sparrow	<i>Zonotrichia albicollis</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
dark-eyed junco	<i>Junco hyemalis</i>			S5	Secure	Field, MBBA, NA BBS
bobolink	<i>Dolichonyx oryzivorus</i>	Threatened	Threatened	S3B,S3M	Sensitive	AC CDC, MBBA, NA BBS
red-winged blackbird	<i>Agelaius phoeniceus</i>			S4B,S4M	Secure	Field, MBBA, NA BBS
rusty blackbird	<i>Euphagus carolinus</i>	Special Concern	Special Concern	S3B,S3M	May Be At Risk	AC CDC, Field, NA BBS
common grackle	<i>Quiscalus quiscula</i>			S5B,S5M	Secure	Field, MBBA, NA BBS
brown-headed cowbird	<i>Molothrus ater</i>			S3B,S3M	May Be At Risk	AC CDC, MBBA, NA BBS
pine grosbeak	<i>Pinicola enucleator</i>			S2B,S4S5N,S4S5M	Sensitive	AC CDC
purple finch	<i>Carpodacus purpureus</i>			S4S5B,SUN,S5M	Secure	Field, NA BBS, MBBA
red crossbill	<i>Loxia curvirostra</i>			S3	Secure	AC CDC
white-winged crossbill	<i>Loxia leucoptera</i>			S5	Secure	Field, MBBA, NA BBS
pine siskin	<i>Carduelis pinus</i>			S3	Secure	AC CDC, MBBA
American goldfinch	<i>Carduelis tristis</i>			S5	Secure	Field, MBBA, NA BBS
evening grosbeak	<i>Coccothraustes vespertinus</i>	Special Concern		S3B,S3S4N,SUM	Sensitive	AC CDC, MBBA, NA BBS

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Survey Date	Survey Time	Temp	Wind	Noise	Common Name	Scientific Name	ObsCount	Sex	Age	Fly By	Seen	Calling	Singing	Incidental	Observer Easting	Observer Northing	Distance	Bearing
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		323492	5232840	94	126
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		323492	5232840	87	244
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		323492	5232840	89	18
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	hairy woodpecker	<i>Picoides villosus</i>	1	M	A						323492	5232840	113	113
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			323492	5232840	95	61
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			323492	5232840	82	328
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		323492	5232840	94	48
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		323492	5232840	89	185
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	U	A			Yes			323492	5232840	34	179
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		323492	5232840	63	349
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		323492	5232840	112	218
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		323492	5232840	91	112
5/12/2017	06:49:59	6	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	M	A						323492	5232840	87	307
5/12/2017	07:25:07	7	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	broad-winged hawk	<i>Buteo platypterus</i>	1	U	A			Yes			324220	5232903	27	68
5/12/2017	07:25:07	7	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	broad-winged hawk	<i>Buteo platypterus</i>	1	U	A			Yes			324220	5232903	97	291
5/12/2017	07:25:07	7	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			324220	5232903	128	35
5/12/2017	07:25:07	7	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	purple finch	<i>Haemorhous purpureus</i>	1	M	A				Yes		324220	5232903	101	47
5/12/2017	07:25:07	7	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes			324220	5232903	78	113
5/12/2017	07:25:07	7	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		324220	5232903	58	146
5/12/2017	07:25:07	7	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		324220	5232903	61	54
5/12/2017	07:25:07	7	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		324220	5232903	88	329

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Survey Date	Survey Time	Temp	Wind	Noise	Common Name	Scientific Name	ObsCount	Sex	Age	Fly By	Seen	Calling	Singing	Incidental	Observer Easting	Observer Northing	Distance	Bearing
5/12/2017	07:25:07	7	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		324220	5232903	105	136
5/12/2017	07:25:07	7	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		324220	5232903	93	308
5/12/2017	08:06:39	10	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		325470	5233022	90	149
5/12/2017	08:06:39	10	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	blue jay	<i>Cyanocitta cristata</i>	1	U	A			Yes			325470	5233022	111	22
5/12/2017	08:06:39	10	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	blue-headed vireo	<i>Vireo solitarius</i>	1	U	A			Yes			325470	5233022	31	64
5/12/2017	08:06:39	10	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		325470	5233022	88	117
5/12/2017	08:06:39	10	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		325470	5233022	54	249
5/12/2017	08:06:39	10	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		325470	5233022	98	180
5/12/2017	08:06:39	10	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		325470	5233022	38	39
5/12/2017	08:06:39	10	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	U	A		Yes				325470	5233022	14	326
5/12/2017	08:06:39	10	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	U	A			Yes			325470	5233022	67	81
5/12/2017	08:06:39	10	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	M	A						325470	5233022	105	337
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	American robin	<i>Turdus migratorius</i>	1	U	A			Yes			325911	5233071	52	290
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	American robin	<i>Turdus migratorius</i>	1	U	A			Yes			325911	5233071	94	75
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		325911	5233071	36	94
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		325911	5233071	48	20
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	blue-headed vireo	<i>Vireo solitarius</i>	1	U	A			Yes			325911	5233071	53	164
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	brown creeper	<i>Certhia Americana</i>	1	M	A				Yes		325911	5233071	79	168
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	golden-crowned kinglet	<i>Regulus satrapa</i>	2	B	A		Yes				325911	5233071	12	321
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	hermit thrush	<i>Catharus guttatus</i>	1	U	A			Yes			325911	5233071	66	130
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		325911	5233071	67	312

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5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		325911	5233071	61	216
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		325911	5233071	96	291
5/12/2017	08:33:10	10	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	U	A			Yes			325911	5233071	89	141
5/12/2017	04:42:04	0			American crow	<i>Corvus brachyrhynchos</i>	1	U	A			Yes			321915	5232698	127	8
5/12/2017	04:42:04	0			American robin	<i>Turdus migratorius</i>	1	U	A			Yes			321915	5232698	128	346
5/12/2017	04:42:04	0			black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		321915	5232698	68	322
5/12/2017	04:42:04	0			blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		321915	5232698	71	102
5/12/2017	04:42:04	0			dark-eyed junco	<i>Junco hyemalis</i>	1	U	A			Yes			321915	5232698	66	139
5/12/2017	04:42:04	0			northern flicker	<i>Colaptes auratus</i>	1	M	A			Yes			321915	5232698	112	356
5/12/2017	04:42:04	0			white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		321915	5232698	39	205
5/12/2017	04:42:04	0			white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		321915	5232698	58	295
5/12/2017	04:42:04	0			white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		321915	5232698	100	333
5/12/2017	04:42:04	0			winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		321915	5232698	76	20
5/12/2017	04:42:04	0			yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		321915	5232698	56	180
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	American crow	<i>Corvus brachyrhynchos</i>	1	U	A			Yes			322226	5232724	120	344
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	U	A			Yes			322226	5232724	96	111
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	1	U	A			Yes			322226	5232724	116	326
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		322226	5232724	120	42
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	U	A			Yes			322226	5232724	27	189
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	U	A			Yes			322226	5232724	72	107

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5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			322226	5232724	127	33
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes			322226	5232724	30	249
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes			322226	5232724	83	334
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322226	5232724	47	124
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322226	5232724	62	344
5/12/2017	05:16:47	6	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322226	5232724	93	50
5/12/2017	05:41:56	6	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	American goldfinch	<i>Spinus tristis</i>	1	U	A			Yes			322552	5232758	58	97
5/12/2017	05:41:56	6	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	dark-eyed junco	<i>Junco hyemalis</i>	1	U			Yes				322552	5232758	29	254
5/12/2017	05:41:56	6	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	golden-crowned kinglet	<i>Regulus satrapa</i>	1	U	A			Yes			322552	5232758	36	218
5/12/2017	05:41:56	6	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	northern flicker	<i>Colaptes auratus</i>	1	M	A						322552	5232758	121	58
5/12/2017	05:41:56	6	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		322552	5232758	90	190
5/12/2017	05:41:56	6	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322552	5232758	62	303
5/12/2017	05:41:56	6	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	U	A			Yes			322552	5232758	57	34
5/12/2017	05:41:56	6	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	U	A			Yes			322552	5232758	54	19
5/12/2017	05:41:56	6	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322552	5232758	86	338
5/12/2017	05:41:56	6	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322552	5232758	113	39
5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		322896	5232783	88	102
5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	dark-eyed junco	<i>Junco hyemalis</i>	1	U	A			Yes			322896	5232783	39	252
5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	dark-eyed junco	<i>Junco hyemalis</i>	1	U	A			Yes			322896	5232783	45	296
5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		322896	5232783	77	45

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5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	golden-crowned kinglet	<i>Regulus satrapa</i>	1	U	A			Yes			322896	5232783	20	195
5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			322896	5232783	70	231
5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322896	5232783	80	137
5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322896	5232783	32	158
5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	U	A			Yes			322896	5232783	30	71
5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322896	5232783	41	322
5/12/2017	06:05:41	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	U	A		Yes				322896	5232783	63	28
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		323206	5232812	81	174
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	blue jay	<i>Cyanocitta cristata</i>	1	U	A			Yes			323206	5232812	113	26
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	downy woodpecker	<i>Picoides pubescens</i>	1	M	A						323206	5232812	118	158
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			323206	5232812	131	50
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	purple finch	<i>Haemorhous purpureus</i>	1	M	A				Yes		323206	5232812	116	185
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	rusty blackbird	<i>Euphagus carolinus</i>	2	U	A	Yes					323206	5232812	110	288
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		323206	5232812	100	219
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		323206	5232812	73	229
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		323206	5232812	42	146
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	U	A			Yes			323206	5232812	33	71
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		323206	5232812	88	336
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	M	A						323206	5232812	117	60
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	M	A						323206	5232812	114	42
5/12/2017	06:29:06	6	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		323206	5232812	97	184

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Survey Date	Survey Time	Temp	Wind	Noise	Common Name	Scientific Name	ObsCount	Sex	Age	Fly By	Seen	Calling	Singing	Incidental	Observer Easting	Observer Northing	Distance	Bearing
5/12/2017	07:06:17	10	Light air - 1 to 5 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		326620	5233137	9	213
5/12/2017	07:06:17	10	Light air - 1 to 5 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	U	A			Yes			326620	5233137	90	84
5/12/2017	07:06:17	10	Light air - 1 to 5 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		326620	5233137	71	319
5/12/2017	07:06:17	10	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		326620	5233137	56	122
5/12/2017	07:06:17	10	Light air - 1 to 5 km/h	Quiet	common raven	<i>Corvus corax</i>	1	U	A			Yes		Yes	326620	5233137	101	80
5/12/2017	07:06:17	10	Light air - 1 to 5 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		326620	5233137	56	271
5/12/2017	07:06:17	10	Light air - 1 to 5 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	U	A		Yes				326620	5233137	28	169
5/12/2017	07:06:17	10	Light air - 1 to 5 km/h	Quiet	ruffed grouse	<i>Bonasa umbellus</i>	1	M	A						326620	5233137	88	169
5/12/2017	07:06:17	10	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		326620	5233137	97	296
5/12/2017	07:26:38	8	Light air - 1 to 5 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		326934	5233162	79	289
5/12/2017	07:26:38	8	Light air - 1 to 5 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	2	M	A				Yes		326934	5233162	50	119
5/12/2017	07:26:38	8	Light air - 1 to 5 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		326934	5233162	43	69
5/12/2017	07:26:38	8	Light air - 1 to 5 km/h	Quiet	gray jay	<i>Perisoreus canadensis</i>	1	U	A			Yes		Yes	326934	5233162	104	295
5/12/2017	07:26:38	8	Light air - 1 to 5 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	U	A			Yes			326934	5233162	26	256
5/12/2017	07:26:38	8	Light air - 1 to 5 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			326934	5233162	69	183
5/12/2017	07:26:38	8	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		326934	5233162	90	97
5/12/2017	07:26:38	8	Light air - 1 to 5 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		326934	5233162	19	53
5/12/2017	07:48:34	8	Light air - 1 to 5 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		327252	5233185	88	9
5/12/2017	07:48:34	8	Light air - 1 to 5 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	1	U	A			Yes		Yes	327252	5233185	106	66
5/12/2017	07:48:34	8	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		327252	5233185	65	131
5/12/2017	07:48:34	8	Light air - 1 to 5 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	M	A			Yes		Yes	327252	5233185	114	31

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5/12/2017	07:48:34	8	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		327252	5233185	83	305
5/12/2017	07:48:34	8	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		327252	5233185	89	85
5/12/2017	07:48:34	8	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		327252	5233185	59	8
5/12/2017	07:48:34	8	Light air - 1 to 5 km/h	Quiet	ruffed grouse	<i>Bonasa umbellus</i>	1	M	A						327252	5233185	98	37
5/12/2017	07:48:34	8	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		327252	5233185	85	73
5/12/2017	07:48:34	8	Light air - 1 to 5 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		327252	5233185	21	50
5/12/2017	08:15:21	8	Light air - 1 to 5 km/h	Quiet	gray jay	<i>Perisoreus canadensis</i>	1	U	A			Yes			327586	5233217	72	297
5/12/2017	08:15:21	8	Light air - 1 to 5 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			327586	5233217	71	70
5/12/2017	08:15:21	8	Light air - 1 to 5 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			327586	5233217	60	310
5/12/2017	08:15:21	8	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		327586	5233217	95	340
5/12/2017	08:15:21	8	Light air - 1 to 5 km/h	Quiet	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		327586	5233217	69	325
5/12/2017	08:35:32	8	Light Breeze - 6 to 11 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		327884	5233257	90	52
5/12/2017	08:35:32	8	Light Breeze - 6 to 11 km/h	Quiet	common raven	<i>Corvus corax</i>	1	U	A			Yes		Yes	327884	5233257	114	71
5/12/2017	08:35:32	8	Light Breeze - 6 to 11 km/h	Quiet	unidentified woodpecker	All woodpeckers; most commonly for those heard rather than seen	1								327884	5233257	70	28
5/12/2017	08:35:32	8	Light Breeze - 6 to 11 km/h	Quiet	Canada goose		2	U	A	Yes					327884	5233257	43	294
5/12/2017	08:54:18	8	Gentle Breeze - 12 to 19 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		328194	5233274	20	321
5/12/2017	08:54:18	8	Gentle Breeze - 12 to 19 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	U	A			Yes			328194	5233274	54	44
5/12/2017	08:54:18	8	Gentle Breeze - 12 to 19 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	1	U	A			Yes			328194	5233274	94	273
5/12/2017	08:54:18	8	Gentle Breeze - 12 to 19 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes		Yes	328194	5233274	113	288

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5/12/2017	08:54:18	8	Gentle Breeze - 12 to 19 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	2	U	A		Yes				328194	5233274	55	229
5/12/2017	08:54:18	8	Gentle Breeze - 12 to 19 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		328194	5233274	77	352
5/12/2017	08:54:18	8	Gentle Breeze - 12 to 19 km/h	Quiet	ruffed grouse	<i>Bonasa umbellus</i>	1	U	A		Yes				328194	5233274	14	358
5/12/2017	08:54:18	8	Gentle Breeze - 12 to 19 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		328194	5233274	87	73
5/12/2017	08:54:18	8	Gentle Breeze - 12 to 19 km/h	Quiet	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		328194	5233274	70	32
5/12/2017	08:54:18	8	Gentle Breeze - 12 to 19 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		328194	5233274	59	56
5/12/2017	09:13:25	8	Gentle Breeze - 12 to 19 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		328658	5233319	83	78
5/12/2017	09:13:25	8	Gentle Breeze - 12 to 19 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	1	U	A			Yes		Yes	328658	5233319	101	274
5/12/2017	09:13:25	8	Gentle Breeze - 12 to 19 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		328658	5233319	76	278
5/12/2017	09:13:25	8	Gentle Breeze - 12 to 19 km/h	Quiet	common raven	<i>Corvus corax</i>	1	U	A			Yes			328658	5233319	95	220
5/12/2017	09:13:25	8	Gentle Breeze - 12 to 19 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		328658	5233319	43	3
5/12/2017	09:13:25	8	Gentle Breeze - 12 to 19 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		328658	5233319	83	93
5/12/2017	09:13:25	8	Gentle Breeze - 12 to 19 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		328658	5233319	84	326
5/12/2017	09:13:25	8	Gentle Breeze - 12 to 19 km/h	Quiet	unidentified woodpecker	All woodpeckers; most commonly for those heard rather than seen	1	M	A			Yes			328658	5233319	70	332
5/12/2017	09:13:25	8	Gentle Breeze - 12 to 19 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		328658	5233319	70	296
5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	American crow	<i>Corvus brachyrhynchos</i>	20	B	A		Yes			Yes	331333	5233562	107	260
5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	American crow	<i>Corvus brachyrhynchos</i>	1	U	A	Yes	Yes				331333	5233562	12	321
5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		331333	5233562	49	151
5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A		Yes				331333	5233562	26	104

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5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		331333	5233562	23	188
5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	2	M	A	Yes					331333	5233562	31	309
5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		331333	5233562	53	242
5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	2	U	A		Yes				331333	5233562	15	27
5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		331333	5233562	37	44
5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		331333	5233562	91	34
5/13/2017	09:18:03	12	Light Breeze - 6 to 11 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		331333	5233562	67	126
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	American crow	<i>Corvus brachyrhynchos</i>	1	U	A			Yes		Yes	332018	5233670	111	103
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	American crow	<i>Corvus brachyrhynchos</i>	1	U	A			Yes			332018	5233670	122	141
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		332018	5233670	55	129
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	F	A		Yes				332018	5233670	26	68
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		332018	5233670	57	162
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	common raven	<i>Corvus corax</i>	1	U	A			Yes		Yes	332018	5233670	114	225
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		332018	5233670	22	132
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	M	A				Yes	Yes	332018	5233670	113	322
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	U	U			Yes			332018	5233670	90	282
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		332018	5233670	71	127
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	purple finch	<i>Haemorhous purpureus</i>	1	M	A				Yes		332018	5233670	35	178
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		332018	5233670	58	114
5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		332018	5233670	45	249

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5/13/2017	08:49:15	10	Light Breeze - 6 to 11 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		332018	5233670	90	128
5/13/2017	08:26:50	10	Light Breeze - 6 to 11 km/h	Quiet	American crow	<i>Corvus brachyrhynchos</i>	1	U	A			Yes			332317	5233723	114	174
5/13/2017	08:26:50	10	Light Breeze - 6 to 11 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	U	A		Yes	Yes			332317	5233723	48	265
5/13/2017	08:26:50	10	Light Breeze - 6 to 11 km/h	Quiet	belted kingfisher	<i>Megaceryle alcyon</i>	1	U	A			Yes			332317	5233723	110	83
5/13/2017	08:26:50	10	Light Breeze - 6 to 11 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		332317	5233723	56	132
5/13/2017	08:26:50	10	Light Breeze - 6 to 11 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	U	A			Yes			332317	5233723	54	326
5/13/2017	08:26:50	10	Light Breeze - 6 to 11 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			332317	5233723	16	120
5/13/2017	08:26:50	10	Light Breeze - 6 to 11 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		332317	5233723	57	256
5/13/2017	08:26:50	10	Light Breeze - 6 to 11 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		332317	5233723	61	48
5/13/2017	08:26:50	10	Light Breeze - 6 to 11 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		332317	5233723	56	113
5/13/2017	08:26:50	10	Light Breeze - 6 to 11 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		332317	5233723	50	232
5/13/2017	08:00:45	10	Light air - 1 to 5 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		332904	5233825	55	241
5/13/2017	08:00:45	10	Light air - 1 to 5 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		332904	5233825	66	37
5/13/2017	08:00:45	10	Light air - 1 to 5 km/h	Quiet	downy woodpecker	<i>Picoides pubescens</i>	1	M	A						332904	5233825	113	169
5/13/2017	08:00:45	10	Light air - 1 to 5 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	U	A		Yes				332904	5233825	5	142
5/13/2017	08:00:45	10	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	2	U	A			Yes			332904	5233825	74	224
5/13/2017	08:00:45	10	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		332904	5233825	62	98
5/13/2017	08:00:45	10	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		332904	5233825	88	111
5/13/2017	08:00:45	10	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		332904	5233825	58	345
5/13/2017	08:00:45	10	Light air - 1 to 5 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		332904	5233825	30	157

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Survey Date	Survey Time	Temp	Wind	Noise	Common Name	Scientific Name	ObsCount	Sex	Age	Fly By	Seen	Calling	Singing	Incidental	Observer Easting	Observer Northing	Distance	Bearing
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		333209	5233885	74	38
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	U	A			Yes			333209	5233885	34	247
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	M	A						333209	5233885	124	152
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes			333209	5233885	100	98
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes			333209	5233885	94	315
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		333209	5233885	71	123
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		333209	5233885	94	46
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		333209	5233885	110	40
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	tree swallow	<i>Tachycineta bicolor</i>	1	U	A	Yes		Yes			333209	5233885	46	73
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		333209	5233885	63	59
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		333209	5233885	108	13
5/13/2017	07:40:14	8	Light air - 1 to 5 km/h	Quiet	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	U	A			Yes			333209	5233885	46	331
5/13/2017	07:19:00	7	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American crow	<i>Corvus brachyrhynchos</i>	1	U	A			Yes			333564	5233953	93	149
5/13/2017	07:19:00	7	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American crow	<i>Corvus brachyrhynchos</i>	2	U	A			Yes			333564	5233953	127	326
5/13/2017	07:19:00	7	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American goldfinch	<i>Spinus tristis</i>	1	U	A	Yes		Yes			333564	5233953	53	233
5/13/2017	07:19:00	7	Calm - < 1 km/h	Light Noise (temporary, not distracting)	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		333564	5233953	88	307
5/13/2017	07:19:00	7	Calm - < 1 km/h	Light Noise (temporary, not distracting)	boreal chickadee	<i>Poecile hudsonicus</i>	1	U	A			Yes			333564	5233953	93	21
5/13/2017	07:19:00	7	Calm - < 1 km/h	Light Noise (temporary, not distracting)	golden-crowned kinglet	<i>Regulus satrapa</i>	1	U	A			Yes			333564	5233953	25	25
5/13/2017	07:19:00	7	Calm - < 1 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		333564	5233953	105	223

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5/13/2017	07:19:00	7	Calm - < 1 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		333564	5233953	40	122
5/13/2017	07:19:00	7	Calm - < 1 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		333564	5233953	111	112
5/13/2017	07:19:00	7	Calm - < 1 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		333564	5233953	88	39
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American goldfinch	<i>Spinus tristis</i>	1	U	A	Yes					334980	5234208	114	57
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		334980	5234208	38	85
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	common grackle	<i>Quiscalus quiscula</i>	1	M	A				Yes		334980	5234208	110	77
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	downy woodpecker	<i>Picoides pubescens</i>	1	M	A						334980	5234208	88	297
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	hermit thrush	<i>Catharus guttatus</i>	1	U	A			Yes			334980	5234208	61	17
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	mourning dove	<i>Zenaida macroura</i>	1	M	A				Yes		334980	5234208	113	252
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	northern flicker	<i>Colaptes auratus</i>	1	M	A						334980	5234208	103	309
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes			334980	5234208	63	114
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		334980	5234208	28	221
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		334980	5234208	76	6
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		334980	5234208	113	151
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		334980	5234208	59	35
5/13/2017	06:23:32	5	Calm - < 1 km/h	Light Noise (temporary, not distracting)	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		334980	5234208	79	82
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American goldfinch	<i>Spinus tristis</i>	1	U	A	Yes					335545	5234314	38	78
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		335545	5234314	98	69
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		335545	5234314	55	111
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		335545	5234314	47	24
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	common grackle	<i>Quiscalus quiscula</i>	1	M	A				Yes		335545	5234314	85	316

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5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	golden-crowned kinglet	<i>Regulus satrapa</i>	1	U	A			Yes			335545	5234314	25	185
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	hairy woodpecker	<i>Picoides villosus</i>	1	M	A						335545	5234314	138	48
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	pileated woodpecker	<i>Dryocopus pileatus</i>	1	M	A						335545	5234314	121	56
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes			335545	5234314	78	76
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		335545	5234314	85	27
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	swamp sparrow	<i>Melospiza georgiana</i>	1	M	A				Yes		335545	5234314	62	342
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		335545	5234314	101	13
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	M	A						335545	5234314	115	46
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	M	A						335545	5234314	116	336
5/13/2017	05:54:19	1	Calm - < 1 km/h	Light Noise (temporary, not distracting)	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		335545	5234314	88	336
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American crow	<i>Corvus brachyrhynchos</i>	1	U	A			Yes			335990	5234412	109	215
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American crow	<i>Corvus brachyrhynchos</i>	1	U	A	Yes					335990	5234412	8	260
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American crow	<i>Corvus brachyrhynchos</i>	1	U	A	Yes					335990	5234412	11	322
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American crow	<i>Corvus brachyrhynchos</i>	1	U	A			Yes			335990	5234412	123	27
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		335990	5234412	89	323
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		335990	5234412	69	25
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	blue-headed vireo	<i>Vireo solitarius</i>	2	B	A		Yes				335990	5234412	20	227
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		335990	5234412	61	226
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		335990	5234412	97	98

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5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	pileated woodpecker	<i>Dryocopus pileatus</i>	1	M	A						335990	5234412	98	343
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	purple finch	<i>Haemorhous purpureus</i>	1	M	A				Yes		335990	5234412	61	302
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes			335990	5234412	93	356
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		335990	5234412	89	59
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		335990	5234412	63	122
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		335990	5234412	91	274
5/13/2017	05:32:18	0	Calm - < 1 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		335990	5234412	59	35
5/13/2017	08:04:15	10	Light air - 1 to 5 km/h	Quiet	American goldfinch	<i>Spinus tristis</i>	1	U	A			Yes			319421	5232451	94	71
5/13/2017	08:04:15	10	Light air - 1 to 5 km/h	Quiet	common raven	<i>Corvus corax</i>	1	U	A			Yes		Yes	319421	5232451	127	159
5/13/2017	08:04:15	10	Light air - 1 to 5 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		319421	5232451	59	290
5/13/2017	08:04:15	10	Light air - 1 to 5 km/h	Quiet	purple finch	<i>Haemorhous purpureus</i>	1	M	A				Yes		319421	5232451	73	12
5/13/2017	08:04:15	10	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		319421	5232451	94	43
5/13/2017	08:04:15	10	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		319421	5232451	61	306
5/13/2017	08:04:15	10	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		319421	5232451	88	136
5/13/2017	08:04:15	10	Light air - 1 to 5 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		319421	5232451	93	289
5/13/2017	08:04:15	10	Light air - 1 to 5 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		319421	5232451	67	48
5/13/2017	08:22:50	10	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		319723	5232492	56	75
5/13/2017	08:22:50	10	Light air - 1 to 5 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		319723	5232492	24	310
5/13/2017	08:22:50	10	Light air - 1 to 5 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	U	A			Yes			319723	5232492	70	19
5/13/2017	08:22:50	10	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		319723	5232492	91	302
5/13/2017	08:22:50	10	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		319723	5232492	96	56

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5/13/2017	08:22:50	10	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		319723	5232492	20	30
5/13/2017	08:22:50	10	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		319723	5232492	73	65
5/13/2017	08:22:50	10	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		319723	5232492	88	252
5/13/2017	08:22:50	10	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		319723	5232492	96	41
5/13/2017	08:22:50	10	Light air - 1 to 5 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		319723	5232492	94	76
5/13/2017	08:43:28	10	Light air - 1 to 5 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	U	A			Yes			320023	5232517	58	316
5/13/2017	08:43:28	10	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		320023	5232517	80	254
5/13/2017	08:43:28	10	Light air - 1 to 5 km/h	Quiet	brown creeper	<i>Certhia Americana</i>	1	M	A				Yes		320023	5232517	14	310
5/13/2017	08:43:28	10	Light air - 1 to 5 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		320023	5232517	90	289
5/13/2017	08:43:28	10	Light air - 1 to 5 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		320023	5232517	35	320
5/13/2017	08:43:28	10	Light air - 1 to 5 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			320023	5232517	68	306
5/13/2017	08:43:28	10	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		320023	5232517	50	139
5/13/2017	08:43:28	10	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		320023	5232517	33	58
5/13/2017	08:43:28	10	Light air - 1 to 5 km/h	Quiet	swamp sparrow	<i>Melospiza georgiana</i>	1	M	A				Yes		320023	5232517	60	100
5/13/2017	08:43:28	10	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		320023	5232517	74	73
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	American crow	<i>Corvus brachyrhynchos</i>	1	U	A			Yes		Yes	339322	5234822	122	328
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		339322	5234822	76	317
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		339322	5234822	22	176
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	U	A		Yes				339322	5234822	61	110
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		339322	5234822	45	59

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5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		339322	5234822	58	2
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	2	U	A			Yes			339322	5234822	64	27
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	U	A			Yes			339322	5234822	91	298
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		339322	5234822	89	203
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		339322	5234822	33	146
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	ruffed grouse	<i>Bonasa umbellus</i>	1	M	A						339322	5234822	84	221
5/13/2017	06:41:28	4	Light air - 1 to 5 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		339322	5234822	47	260
5/13/2017	06:19:43	2	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	American crow	<i>Corvus brachyrhynchos</i>	2	U	A			Yes		Yes	339626	5234702	117	56
5/13/2017	06:19:43	2	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		339626	5234702	70	303
5/13/2017	06:19:43	2	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		339626	5234702	60	277
5/13/2017	06:19:43	2	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		339626	5234702	47	52
5/13/2017	06:19:43	2	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		339626	5234702	24	292
5/13/2017	06:19:43	2	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		339626	5234702	64	44
5/13/2017	06:19:43	2	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		339626	5234702	88	71
5/13/2017	06:19:43	2	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		339626	5234702	52	24
5/13/2017	06:19:43	2	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		339626	5234702	59	103
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	alder flycatcher	<i>Empidonax alnorum</i>	1	M	A				Yes		318725	5232032	84	195
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	alder flycatcher	<i>Empidonax alnorum</i>	1	M	A				Yes		318725	5232032	84	200
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		318725	5232032	59	341
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		318725	5232032	89	350
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	U	A			Yes			318725	5232032	27	318

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6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		318725	5232032	96	360
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		318725	5232032	94	244
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		318725	5232032	99	6
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		318725	5232032	76	251
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		318725	5232032	82	29
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	lincoln's sparrow	<i>Melospiza lincolni</i>	1	M	A				Yes	Yes	318725	5232032	139	321
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	lincoln's sparrow	<i>Melospiza lincolni</i>	1	M	A				Yes		318725	5232032	72	326
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		318725	5232032	90	161
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes	Yes	318725	5232032	113	350
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		318725	5232032	91	22
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		318725	5232032	66	130
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	palm warbler	<i>Setophaga palmarum</i>	1	M	A						318725	5232032	45	28
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		318725	5232032	63	192
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		318725	5232032	65	37
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		318725	5232032	90	334
6/13/2017	05:51:46	19	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		318725	5232032	99	333
6/13/2017	06:24:46	19	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		319536	5232601	79	34
6/13/2017	06:24:46	19	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		319536	5232601	23	322
6/13/2017	06:24:46	19	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		319536	5232601	56	331
6/13/2017	06:24:46	19	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		319536	5232601	82	329

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6/13/2017	06:24:46	19	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		319536	5232601	46	118
6/13/2017	06:24:46	19	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		319536	5232601	44	111
6/13/2017	06:24:46	19	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		319536	5232601	95	268
6/13/2017	06:24:46	19	Light air - 1 to 5 km/h	Light Noise (temporary, not distracting)	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes	Yes	319536	5232601	132	240
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		320590	5232830	91	350
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		320590	5232830	86	354
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		320590	5232830	37	281
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		320590	5232830	83	258
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		320590	5232830	24	11
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	common raven	<i>Corvus corax</i>	1	U	A			Yes			320590	5232830	82	307
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		320590	5232830	79	118
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		320590	5232830	40	64
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		320590	5232830	71	15
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		320590	5232830	83	119
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		320590	5232830	52	17
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		320590	5232830	81	326
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		320590	5232830	76	17
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		320590	5232830	83	34
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	M	A				Yes		320590	5232830	81	71
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	M	A				Yes		320590	5232830	84	14
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		320590	5232830	49	350

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6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	olive-sided flycatcher	<i>Contopus cooperi</i>	1	M	A				Yes		320590	5232830	82	335
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	olive-sided flycatcher	<i>Contopus cooperi</i>	1	M	A				Yes		320590	5232830	95	12
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		320590	5232830	77	310
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		320590	5232830	94	309
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	purple finch	<i>Haemorhous purpureus</i>	1	M	A				Yes		320590	5232830	79	151
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes			320590	5232830	84	25
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		320590	5232830	70	341
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	Tennessee warbler	<i>Oreothlypis peregrina</i>	1	M	A				Yes		320590	5232830	92	61
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		320590	5232830	92	306
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		320590	5232830	94	203
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		320590	5232830	95	272
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		320590	5232830	93	5
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		320590	5232830	65	4
6/13/2017	07:00:35	19	Calm - < 1 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		320590	5232830	61	16
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		321057	5232294	94	207
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		321057	5232294	56	44
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		321057	5232294	81	312
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		321057	5232294	60	173
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		321057	5232294	61	179
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	M	A				Yes	Yes	321057	5232294	133	28

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6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	M	A				Yes	Yes	321057	5232294	134	32
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		321057	5232294	92	272
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		321057	5232294	87	322
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		321057	5232294	59	218
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		321057	5232294	57	338
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	olive-sided flycatcher	<i>Contopus cooperi</i>	1	M	A				Yes		321057	5232294	94	197
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	olive-sided flycatcher	<i>Contopus cooperi</i>	1	M	A				Yes		321057	5232294	93	198
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes	Yes	321057	5232294	104	35
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	Tennessee warbler	<i>Oreothlypis peregrina</i>	1	M	A				Yes		321057	5232294	72	43
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	Tennessee warbler	<i>Oreothlypis peregrina</i>	1	M	A				Yes		321057	5232294	83	44
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		321057	5232294	38	49
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		321057	5232294	89	60
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	yellow-bellied flycatcher	<i>Empidonax flaviventris</i>	1	U	A			Yes		Yes	321057	5232294	116	241
6/13/2017	07:29:27	19	Calm - < 1 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes	Yes	321057	5232294	120	192
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		321904	5232206	63	297
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		321904	5232206	68	151
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		321904	5232206	68	144
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		321904	5232206	31	308
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		321904	5232206	38	329
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		321904	5232206	40	330

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Survey Date	Survey Time	Temp	Wind	Noise	Common Name	Scientific Name	ObsCount	Sex	Age	Fly By	Seen	Calling	Singing	Incidental	Observer Easting	Observer Northing	Distance	Bearing
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes	Yes	321904	5232206	112	115
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		321904	5232206	84	33
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		321904	5232206	86	32
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		321904	5232206	77	123
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		321904	5232206	38	340
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		321904	5232206	77	109
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		321904	5232206	65	345
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes	Yes	321904	5232206	124	305
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	yellow-bellied flycatcher	<i>Empidonax flaviventris</i>	1	U	A			Yes			321904	5232206	80	45
6/13/2017	08:05:45	20	Calm - < 1 km/h	Quiet	yellow-bellied flycatcher	<i>Empidonax flaviventris</i>	1	M	A				Yes		321904	5232206	87	50
6/13/2017	08:38:16	21	Light air - 1 to 5 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		322451	5232322	46	259
6/13/2017	08:38:16	21	Light air - 1 to 5 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		322451	5232322	89	229
6/13/2017	08:38:16	21	Light air - 1 to 5 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	1	U	A			Yes			322451	5232322	63	317
6/13/2017	08:38:16	21	Light air - 1 to 5 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		322451	5232322	55	318
6/13/2017	08:38:16	21	Light air - 1 to 5 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		322451	5232322	80	323
6/13/2017	08:38:16	21	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes	Yes	322451	5232322	119	30
6/13/2017	08:38:16	21	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		322451	5232322	65	316
6/13/2017	08:38:16	21	Light air - 1 to 5 km/h	Quiet	ruby-throated hummingbird	<i>Archilochus colubris</i>	1	U	A	Yes	Yes				322451	5232322	11	344
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		322687	5232621	36	120
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		322687	5232621	48	126
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	black-throated green warbler	<i>Setophaga virens</i>	1	M	A				Yes		322687	5232621	60	112

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6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	black-throated green warbler	<i>Setophaga virens</i>	1	M	A				Yes		322687	5232621	56	249
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	black-throated green warbler	<i>Setophaga virens</i>	1	M	A				Yes		322687	5232621	53	93
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		322687	5232621	79	80
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		322687	5232621	92	278
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		322687	5232621	46	63
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		322687	5232621	74	249
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		322687	5232621	76	235
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes			322687	5232621	87	62
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		322687	5232621	91	264
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		322687	5232621	26	289
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		322687	5232621	77	222
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		322687	5232621	40	299
6/13/2017	08:59:24	20	Light Breeze - 6 to 11 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		322687	5232621	93	44
6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		322532	5232922	87	258
6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		322532	5232922	85	22
6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		322532	5232922	61	234
6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		322532	5232922	69	239
6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		322532	5232922	68	224
6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322532	5232922	92	267
6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322532	5232922	84	295
6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	gray jay		1	U	U			Yes			322532	5232922	82	203

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6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	gray jay		1	U	U		Yes	Yes			322532	5232922	85	204
6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	gray jay		1	U	J		Yes	Yes			322532	5232922	22	290
6/13/2017	09:22:21	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	gray jay		1	U	A			Yes			322532	5232922	42	286
6/13/2017	09:52:12	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	cedar waxwing	<i>Bombycilla cedrorum</i>	1	U	A			Yes			322170	5233236	99	24
6/13/2017	09:52:12	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		322170	5233236	88	275
6/13/2017	09:52:12	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		322170	5233236	93	39
6/13/2017	09:52:12	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes	Yes	322170	5233236	120	236
6/13/2017	09:52:12	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	Tennessee warbler	<i>Oreothlypis peregrina</i>	1	M	A				Yes	Yes	322170	5233236	137	33
6/13/2017	09:52:12	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	Tennessee warbler	<i>Oreothlypis peregrina</i>	1	M	A				Yes	Yes	322170	5233236	138	33
6/13/2017	09:52:12	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		322170	5233236	86	324
6/13/2017	09:52:12	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes	Yes	322170	5233236	141	40
6/13/2017	09:52:12	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		322170	5233236	87	241
6/13/2017	09:52:12	22	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	gray jay		1	U	U			Yes		Yes	322170	5233236	136	27
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	blackburnian warbler	<i>Setophaga fusca</i>	1	M	A				Yes		328153	5232801	32	342
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	1	U	U			Yes			328153	5232801	94	175
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	1	U	U			Yes			328153	5232801	94	279
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	cedar waxwing	<i>Bombycilla cedrorum</i>	1	U	A			Yes			328153	5232801	55	97
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	cedar waxwing	<i>Bombycilla cedrorum</i>	1	U	U			Yes			328153	5232801	14	34
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		328153	5232801	26	286
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		328153	5232801	64	214
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		328153	5232801	90	268

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6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		328153	5232801	27	11
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		328153	5232801	30	299
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		328153	5232801	62	316
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		328153	5232801	27	316
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		328153	5232801	59	54
6/13/2017	06:06:47	15	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		328153	5232801	65	79
6/13/2017	08:54:58	20	Light Breeze - 6 to 11 km/h	Quiet	black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		326777	5232972	67	341
6/13/2017	08:54:58	20	Light Breeze - 6 to 11 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		326777	5232972	47	37
6/13/2017	08:54:58	20	Light Breeze - 6 to 11 km/h	Quiet	eastern wood-pewee	<i>Contopus virens</i>	1	M	A				Yes		326777	5232972	69	35
6/13/2017	08:54:58	20	Light Breeze - 6 to 11 km/h	Quiet	least flycatcher	<i>Empidonax minimus</i>	1	M	A				Yes		326777	5232972	80	176
6/13/2017	08:54:58	20	Light Breeze - 6 to 11 km/h	Quiet	least flycatcher	<i>Empidonax minimus</i>	1	M	A				Yes		326777	5232972	11	236
6/13/2017	08:54:58	20	Light Breeze - 6 to 11 km/h	Quiet	least flycatcher	<i>Empidonax minimus</i>	1	M	A				Yes		326777	5232972	25	300
6/13/2017	08:54:58	20	Light Breeze - 6 to 11 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		326777	5232972	42	136
6/13/2017	08:54:58	20	Light Breeze - 6 to 11 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		326777	5232972	56	307
6/13/2017	08:54:58	20	Light Breeze - 6 to 11 km/h	Quiet	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	U	U			Yes			326777	5232972	28	13
6/13/2017	09:32:48	20	Light Breeze - 6 to 11 km/h	Quiet	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		327421	5232875	20	306
6/13/2017	09:32:48	20	Light Breeze - 6 to 11 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		327421	5232875	10	167
6/13/2017	09:32:48	20	Light Breeze - 6 to 11 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		327421	5232875	80	227
6/13/2017	09:32:48	20	Light Breeze - 6 to 11 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		327421	5232875	87	193
6/13/2017	08:21:58	20	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		326516	5233421	75	85

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6/13/2017	08:21:58	20	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		326516	5233421	18	353
6/13/2017	08:21:58	20	Light air - 1 to 5 km/h	Quiet	eastern wood-pewee	<i>Contopus virens</i>	1	M	A				Yes		326516	5233421	26	51
6/13/2017	08:21:58	20	Light air - 1 to 5 km/h	Quiet	least flycatcher	<i>Empidonax minimus</i>	1	M	A				Yes		326516	5233421	28	107
6/13/2017	08:21:58	20	Light air - 1 to 5 km/h	Quiet	least flycatcher	<i>Empidonax minimus</i>	1	M	A				Yes		326516	5233421	21	313
6/13/2017	08:21:58	20	Light air - 1 to 5 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		326516	5233421	74	152
6/13/2017	08:21:58	20	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		326516	5233421	80	116
6/13/2017	08:21:58	20	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		326516	5233421	49	286
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		327495	5233420	20	309
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	black-throated green warbler	<i>Setophaga virens</i>	1	M	A				Yes		327495	5233420	82	168
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		327495	5233420	91	355
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	chestnut-sided warbler	<i>Setophaga pensylvanica</i>	1	M	A				Yes		327495	5233420	47	1
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		327495	5233420	64	49
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		327495	5233420	47	254
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		327495	5233420	81	232
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		327495	5233420	88	45
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	U	A			Yes			327495	5233420	62	302
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes	Yes	327495	5233420	116	185
6/13/2017	06:50:44	16	Light air - 1 to 5 km/h	Quiet	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		327495	5233420	89	203
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	American goldfinch	<i>Spinus tristis</i>	1	U	A	Yes		Yes			326776	5233667	29	42
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		326776	5233667	97	203
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	U	U			Yes			326776	5233667	85	287

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Survey Date	Survey Time	Temp	Wind	Noise	Common Name	Scientific Name	ObsCount	Sex	Age	Fly By	Seen	Calling	Singing	Incidental	Observer Easting	Observer Northing	Distance	Bearing
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes	Yes	326776	5233667	114	267
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		326776	5233667	97	302
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		326776	5233667	100	334
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	least flycatcher	<i>Empidonax minimus</i>	1	M	A				Yes		326776	5233667	93	342
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		326776	5233667	64	6
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		326776	5233667	71	330
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes	Yes	326776	5233667	123	177
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		326776	5233667	90	40
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes	Yes	326776	5233667	101	12
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	veery	<i>Catharus fuscescens</i>	1	M	A				Yes	Yes	326776	5233667	116	331
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes	Yes	326776	5233667	112	307
6/13/2017	07:52:00	19	Calm - < 1 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		326776	5233667	89	2
6/13/2017	07:18:30	16	Light air - 1 to 5 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	1	U	A	Yes	Yes	Yes		Yes	327106	5233667	101	356
6/13/2017	07:18:30	16	Light air - 1 to 5 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		327106	5233667	41	80
6/13/2017	07:18:30	16	Light air - 1 to 5 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		327106	5233667	95	7
6/13/2017	07:18:30	16	Light air - 1 to 5 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes	Yes	327106	5233667	114	14
6/13/2017	07:18:30	16	Light air - 1 to 5 km/h	Quiet	northern flicker	<i>Colaptes auratus</i>	1	U	U			Yes		Yes	327106	5233667	115	24
6/13/2017	07:18:30	16	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes	Yes	327106	5233667	118	178
6/13/2017	07:18:30	16	Light air - 1 to 5 km/h	Quiet	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		327106	5233667	87	121
6/13/2017	07:18:30	16	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes	Yes	327106	5233667	116	332
6/13/2017	07:18:30	16	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		327106	5233667	97	74

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6/13/2017	07:18:30	16	Light air - 1 to 5 km/h	Quiet	Wilson's snipe	<i>Gallinago delicata</i>	1	U	A			Yes			327106	5233667	63	327
6/14/2017	05:53:48	12	Calm - < 1 km/h	Quiet	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		324172	5232461	25	300
6/14/2017	05:53:48	12	Calm - < 1 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		324172	5232461	35	212
6/14/2017	05:53:48	12	Calm - < 1 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		324172	5232461	60	303
6/14/2017	05:53:48	12	Calm - < 1 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		324172	5232461	97	68
6/14/2017	05:53:48	12	Calm - < 1 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes		Yes	324172	5232461	139	47
6/14/2017	05:53:48	12	Calm - < 1 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		324172	5232461	94	248
6/14/2017	06:14:16	12	Light air - 1 to 5 km/h	Quiet	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		323806	5232575	34	310
6/14/2017	06:14:16	12	Light air - 1 to 5 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	U	A			Yes			323806	5232575	91	16
6/14/2017	06:14:16	12	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		323806	5232575	95	246
6/14/2017	06:14:16	12	Light air - 1 to 5 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes	Yes	323806	5232575	134	301
6/14/2017	06:14:16	12	Light air - 1 to 5 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		323806	5232575	93	308
6/14/2017	06:14:16	12	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		323806	5232575	67	22
6/14/2017	06:14:16	12	Light air - 1 to 5 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		323806	5232575	85	120
6/14/2017	06:14:16	12	Light air - 1 to 5 km/h	Quiet	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		323806	5232575	71	37
6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	alder flycatcher	<i>Empidonax alnorum</i>	1	U	A			Yes			323471	5232642	42	75
6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	chestnut-sided warbler	<i>Setophaga pensylvanica</i>	1	M	A				Yes		323471	5232642	77	106
6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	chestnut-sided warbler	<i>Setophaga pensylvanica</i>	1	M	A				Yes		323471	5232642	46	265
6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	chestnut-sided warbler	<i>Setophaga pensylvanica</i>	1	M	A				Yes		323471	5232642	65	25
6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		323471	5232642	96	282
6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	least flycatcher	<i>Empidonax minimus</i>	1	U	A			Yes			323471	5232642	66	242

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6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	least flycatcher	<i>Empidonax minimus</i>	1	U	A			Yes			323471	5232642	92	270
6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		323471	5232642	68	291
6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes	Yes	323471	5232642	119	68
6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes	Yes	323471	5232642	124	353
6/14/2017	06:34:39	13	Light Breeze - 6 to 11 km/h	Quiet	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	U	A			Yes		Yes	323471	5232642	114	222
6/14/2017	06:55:53	15	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		323090	5232488	52	293
6/14/2017	06:55:53	15	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		323090	5232488	91	250
6/14/2017	06:55:53	15	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	black-capped chickadee	<i>Poecile atricapillus</i>	1	U	A			Yes			323090	5232488	83	112
6/14/2017	06:55:53	15	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	least flycatcher	<i>Empidonax minimus</i>	1	U	A			Yes			323090	5232488	91	306
6/14/2017	06:55:53	15	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes	Yes	323090	5232488	134	301
6/14/2017	06:55:53	15	Light Breeze - 6 to 11 km/h	Light Noise (temporary, not distracting)	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		323090	5232488	66	29
6/14/2017	07:29:40	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	alder flycatcher	<i>Empidonax alnorum</i>	1	U	A			Yes			323113	5233107	86	315
6/14/2017	07:29:40	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	chestnut-sided warbler	<i>Setophaga pensylvanica</i>	1	M	A				Yes		323113	5233107	39	324
6/14/2017	07:29:40	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	chestnut-sided warbler	<i>Setophaga pensylvanica</i>	1	M	A				Yes		323113	5233107	90	296
6/14/2017	07:29:40	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		323113	5233107	51	304
6/14/2017	07:29:40	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	purple finch	<i>Haemorhous purpureus</i>	1	M	A				Yes	Yes	323113	5233107	148	326
6/14/2017	07:29:40	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A		Yes				323113	5233107	32	246
6/14/2017	07:50:33	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		323418	5233082	54	279
6/14/2017	07:50:33	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		323418	5233082	47	248
6/14/2017	07:50:33	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		323418	5233082	81	68
6/14/2017	08:24:57	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	blackburnian warbler	<i>Setophaga fusca</i>	1	M	A				Yes		323970	5233140	31	10

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6/14/2017	08:24:57	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		323970	5233140	90	193
6/14/2017	08:24:57	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		323970	5233140	50	229
6/14/2017	08:24:57	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		323970	5233140	89	72
6/14/2017	08:24:57	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	Swainson's thrush	<i>Catharus ustulatus</i>	1	U	A			Yes			323970	5233140	91	114
6/14/2017	08:46:06	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	alder flycatcher	<i>Empidonax alnorum</i>	1	U	A			Yes			324403	5233243	56	23
6/14/2017	08:46:06	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		324403	5233243	79	276
6/14/2017	08:46:06	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	cedar waxwing	<i>Bombycilla cedrorum</i>	1	U	A		Yes	Yes			324403	5233243	13	318
6/14/2017	08:46:06	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		324403	5233243	100	74
6/14/2017	08:46:06	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		324403	5233243	45	335
6/14/2017	08:46:06	20	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes	Yes	324403	5233243	113	285
6/14/2017	09:08:36	21	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		324797	5233476	70	193
6/14/2017	09:08:36	21	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		324797	5233476	80	106
6/14/2017	09:08:36	21	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		324797	5233476	60	48
6/14/2017	09:31:48	21	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		325010	5233182	38	146
6/14/2017	09:31:48	21	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		325010	5233182	41	324
6/14/2017	09:31:48	21	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		325010	5233182	90	54
6/14/2017	09:31:48	21	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	least flycatcher	<i>Empidonax minimus</i>	1	U	A			Yes			325010	5233182	91	333
6/14/2017	09:52:52	0			American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		324850	5232820	50	81
6/14/2017	09:52:52	0			least flycatcher	<i>Empidonax minimus</i>	1	U	A			Yes			324850	5232820	50	278
6/14/2017	09:52:52	0			least flycatcher	<i>Empidonax minimus</i>	1	U	A			Yes			324850	5232820	65	54
6/14/2017	09:52:52	0			red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		324850	5232820	83	214
6/14/2017	09:52:52	0			red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		324850	5232820	67	78

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6/14/2017	09:23:23	20	Moderate Breeze - 20 to 28 km/h	Moderate Noise (constant, not overwhelming)	blue jay	<i>Cyanocitta cristata</i>	1	U	U			Yes			325620	5232832	90	83
6/14/2017	09:23:23	20	Moderate Breeze - 20 to 28 km/h	Moderate Noise (constant, not overwhelming)	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		325620	5232832	54	307
6/14/2017	09:23:23	20	Moderate Breeze - 20 to 28 km/h	Moderate Noise (constant, not overwhelming)	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		325620	5232832	57	17
6/14/2017	09:23:23	20	Moderate Breeze - 20 to 28 km/h	Moderate Noise (constant, not overwhelming)	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		325620	5232832	35	316
6/14/2017	09:45:45	19	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		325324	5232885	47	118
6/14/2017	09:45:45	19	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		325324	5232885	88	24
6/14/2017	09:45:45	19	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	golden-crowned kinglet	<i>Regulus satrapa</i>	1	U	U			Yes			325324	5232885	50	223
6/14/2017	09:45:45	19	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	least flycatcher	<i>Empidonax minimus</i>	1	M	A				Yes		325324	5232885	41	292
6/14/2017	09:45:45	19	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		325324	5232885	72	120
6/14/2017	09:45:45	19	Moderate Breeze - 20 to 28 km/h	Light Noise (temporary, not distracting)	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		325324	5232885	74	143
6/14/2017	09:00:04	19	Moderate Breeze - 20 to 28 km/h	Moderate Noise (constant, not overwhelming)	least flycatcher	<i>Empidonax minimus</i>	1	M	A				Yes		325928	5232952	36	306
6/14/2017	09:00:04	19	Moderate Breeze - 20 to 28 km/h	Moderate Noise (constant, not overwhelming)	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		325928	5232952	63	106
6/14/2017	09:00:04	19	Moderate Breeze - 20 to 28 km/h	Moderate Noise (constant, not overwhelming)	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		325928	5232952	36	349
6/14/2017	07:52:31	17	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	alder flycatcher	<i>Empidonax alnorum</i>	1	M	A				Yes		326264	5232941	38	8
6/14/2017	07:52:31	17	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		326264	5232941	56	280
6/14/2017	07:52:31	17	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	American robin	<i>Turdus migratorius</i>	1	M	A				Yes		326264	5232941	91	202
6/14/2017	08:25:47	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	chestnut-sided warbler	<i>Setophaga pensylvanica</i>	1	M	A				Yes		326368	5232639	85	287
6/14/2017	08:25:47	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		326368	5232639	69	278

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6/14/2017	08:25:47	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		326368	5232639	96	260
6/14/2017	08:25:47	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		326368	5232639	67	42
6/14/2017	07:52:31	17	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		326264	5232941	59	70
6/14/2017	07:52:31	17	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		326264	5232941	83	167
6/14/2017	07:52:31	17	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		326264	5232941	68	340
6/14/2017	07:52:31	17	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	swamp sparrow	<i>Melospiza georgiana</i>	1	M	A				Yes		326264	5232941	73	288
6/14/2017	08:25:47	19	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		326368	5232639	97	316
6/14/2017	07:52:31	17	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		326264	5232941	98	223
6/14/2017	07:52:31	17	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		326264	5232941	98	70
6/14/2017	07:52:31	17	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	U	U					Yes	326264	5232941	116	9
6/14/2017	05:54:42	12	Light air - 1 to 5 km/h	Quiet	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		325419	5233256	30	87
6/14/2017	05:54:42	12	Light air - 1 to 5 km/h	Quiet	black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		325419	5233256	91	227
6/14/2017	05:54:42	12	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		325419	5233256	99	216
6/14/2017	05:54:42	12	Light air - 1 to 5 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		325419	5233256	60	277
6/14/2017	05:54:42	12	Light air - 1 to 5 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	M	A				Yes		325419	5233256	86	101
6/14/2017	05:54:42	12	Light air - 1 to 5 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		325419	5233256	41	185
6/14/2017	05:54:42	12	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		325419	5233256	93	131
6/14/2017	05:54:42	12	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		325419	5233256	88	318
6/14/2017	06:46:49	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		325872	5233287	21	310
6/14/2017	06:46:49	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	black-throated green warbler	<i>Setophaga virens</i>	1	M	A				Yes		325872	5233287	75	299
6/14/2017	06:46:49	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	hermit thrush	<i>Catharus guttatus</i>	1	M	A				Yes		325872	5233287	88	55

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6/14/2017	06:46:49	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		325872	5233287	57	27
6/14/2017	06:46:49	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		325872	5233287	81	108
6/14/2017	06:46:49	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		325872	5233287	82	314
6/14/2017	06:46:49	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	purple finch	<i>Haemorhous purpureus</i>	1	M	A				Yes		325872	5233287	62	245
6/14/2017	07:13:38	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	black-capped chickadee	<i>Poecile atricapillus</i>	1	M	A				Yes		326142	5233515	24	325
6/14/2017	07:13:38	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		326142	5233515	54	227
6/14/2017	07:13:38	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		326142	5233515	37	74
6/14/2017	07:13:38	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		326142	5233515	22	235
6/14/2017	07:13:38	15	Gentle Breeze - 12 to 19 km/h	Light Noise (temporary, not distracting)	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		326142	5233515	68	290
6/14/2017	06:20:30	14	Light Breeze - 6 to 11 km/h	Quiet	American redstart	<i>Setophaga ruticilla</i>	1	M	A				Yes		325551	5233565	52	171
6/14/2017	06:20:30	14	Light Breeze - 6 to 11 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	U	U			Yes			325551	5233565	19	39
6/14/2017	06:20:30	14	Light Breeze - 6 to 11 km/h	Quiet	black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		325551	5233565	82	250
6/14/2017	06:20:30	14	Light Breeze - 6 to 11 km/h	Quiet	black-throated green warbler	<i>Setophaga virens</i>	1	M	A				Yes		325551	5233565	66	9
6/14/2017	06:20:30	14	Light Breeze - 6 to 11 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		325551	5233565	29	315
6/14/2017	06:20:30	14	Light Breeze - 6 to 11 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		325551	5233565	25	359
6/14/2017	06:20:30	14	Light Breeze - 6 to 11 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		325551	5233565	71	46
6/15/2017	05:46:57	6	Calm - < 1 km/h	Quiet	black-capped chickadee	<i>Poecile atricapillus</i>	1	U	A			Yes			338315	5235308	94	305
6/15/2017	05:46:57	6	Calm - < 1 km/h	Quiet	cape may warbler	<i>Setophaga tigrina</i>	1	M	A				Yes		338315	5235308	36	99
6/15/2017	05:46:57	6	Calm - < 1 km/h	Quiet	cape may warbler	<i>Setophaga tigrina</i>	1	M	A		Yes		Yes		338315	5235308	10	266
6/15/2017	05:46:57	6	Calm - < 1 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	M	A				Yes		338315	5235308	57	303
6/15/2017	05:46:57	6	Calm - < 1 km/h	Quiet	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		338315	5235308	44	264

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6/15/2017	05:46:57	6	Calm - < 1 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		338315	5235308	64	262
6/15/2017	05:46:57	6	Calm - < 1 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes	Yes	338315	5235308	129	305
6/15/2017	05:46:57	6	Calm - < 1 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		338315	5235308	79	68
6/15/2017	05:46:57	6	Calm - < 1 km/h	Quiet	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		338315	5235308	86	227
6/15/2017	05:46:57	6	Calm - < 1 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes	Yes	338315	5235308	129	320
6/15/2017	06:12:38	6	Light air - 1 to 5 km/h	Quiet	bay-breasted warbler	<i>Setophaga castanea</i>	1	M	A		Yes		Yes		335716	5234568	28	72
6/15/2017	06:12:38	6	Light air - 1 to 5 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		335716	5234568	35	191
6/15/2017	06:12:38	6	Light air - 1 to 5 km/h	Quiet	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		335716	5234568	86	50
6/15/2017	06:12:38	6	Light air - 1 to 5 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes	Yes	335716	5234568	133	232
6/15/2017	06:12:38	6	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		335716	5234568	51	10
6/15/2017	06:12:38	6	Light air - 1 to 5 km/h	Quiet	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		335716	5234568	94	269
6/15/2017	06:12:38	6	Light air - 1 to 5 km/h	Quiet	yellow-rumped warbler	<i>Setophaga coronata</i>	1	M	A				Yes		335716	5234568	48	295
6/15/2017	06:36:36	7	Light air - 1 to 5 km/h	Quiet	American crow	<i>Corvus brachyrhynchos</i>	1	U	A			Yes		Yes	335755	5233952	128	123
6/15/2017	06:36:36	7	Light air - 1 to 5 km/h	Quiet	cape may warbler	<i>Setophaga tigrina</i>	1	M	A				Yes		335755	5233952	41	8
6/15/2017	06:36:36	7	Light air - 1 to 5 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		335755	5233952	17	100
6/15/2017	06:36:36	7	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		335755	5233952	92	247
6/15/2017	06:36:36	7	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		335755	5233952	53	43
6/15/2017	07:12:21	8	Light air - 1 to 5 km/h	Quiet	dark-eyed junco	<i>Junco hyemalis</i>	1	U	A				Yes		333650	5234216	43	283
6/15/2017	07:12:21	8	Light air - 1 to 5 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		333650	5234216	28	67
6/15/2017	07:12:21	8	Light air - 1 to 5 km/h	Quiet	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		333650	5234216	57	84

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6/15/2017	07:12:21	8	Light air - 1 to 5 km/h	Quiet	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		333650	5234216	70	304
6/15/2017	07:12:21	8	Light air - 1 to 5 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		333650	5234216	84	116
6/15/2017	07:12:21	8	Light air - 1 to 5 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		333650	5234216	51	2
6/15/2017	07:12:21	8	Light air - 1 to 5 km/h	Quiet	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		333650	5234216	91	194
6/15/2017	07:12:21	8	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		333650	5234216	68	281
6/15/2017	07:12:21	8	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		333650	5234216	93	281
6/15/2017	07:34:53	8	Light air - 1 to 5 km/h	Quiet	black-throated green warbler	<i>Setophaga virens</i>	1	M	A				Yes		333308	5234218	77	74
6/15/2017	07:34:53	8	Light air - 1 to 5 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	U	A			Yes			333308	5234218	77	238
6/15/2017	07:34:53	8	Light air - 1 to 5 km/h	Quiet	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		333308	5234218	91	263
6/15/2017	07:34:53	8	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		333308	5234218	96	158
6/15/2017	07:34:53	8	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	U	A			Yes		Yes	333308	5234218	130	121
6/15/2017	07:34:53	8	Light air - 1 to 5 km/h	Quiet	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		333308	5234218	47	307
6/15/2017	08:58:20	0			black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		332750	5234264	92	2
6/15/2017	08:58:20	0			chestnut-sided warbler	<i>Setophaga pensylvanica</i>	1	M	A				Yes		332750	5234264	61	277
6/15/2017	08:58:20	0			red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes	Yes	332750	5234264	109	307
6/15/2017	08:58:20	0			white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		332750	5234264	83	293
6/15/2017	09:39:11	0			black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		332271	5234074	42	265
6/15/2017	09:39:11	0			hermit thrush	<i>Catharus guttatus</i>	1	M	A				Yes		332271	5234074	87	46
6/15/2017	09:39:11	0			ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		332271	5234074	78	334
6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	black-and-white warbler	<i>Mniotilta varia</i>	1	M	A		Yes		Yes		330002	5233268	0	0
6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	1	U	U			Yes		Yes	330002	5233268	116	315

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6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		330002	5233268	43	328
6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		330002	5233268	39	303
6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	northern waterthrush	<i>Parkesia noveboracensis</i>	1	M	A				Yes		330002	5233268	44	92
6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		330002	5233268	76	328
6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	red-breasted nuthatch	<i>Sitta canadensis</i>	1	M	A				Yes		330002	5233268	73	39
6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		330002	5233268	56	53
6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		330002	5233268	87	276
6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	swamp sparrow	<i>Melospiza georgiana</i>	1	U	A		Yes	Yes			330002	5233268	9	332
6/15/2017	07:50:39	11	Light air - 1 to 5 km/h	Quiet	yellow-bellied flycatcher	<i>Empidonax flaviventris</i>	1	M	A				Yes		330002	5233268	37	244
6/15/2017	09:10:31	12	Light air - 1 to 5 km/h	Quiet	black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		329211	5233265	28	1
6/15/2017	09:10:31	12	Light air - 1 to 5 km/h	Quiet	black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		329211	5233265	67	57
6/15/2017	09:10:31	12	Light air - 1 to 5 km/h	Quiet	common raven	<i>Corvus corax</i>	1	U	U			Yes			329211	5233265	90	342
6/15/2017	09:10:31	12	Light air - 1 to 5 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	M	A				Yes		329211	5233265	99	302
6/15/2017	09:10:31	12	Light air - 1 to 5 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		329211	5233265	51	322
6/15/2017	09:10:31	12	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		329211	5233265	71	127
6/15/2017	09:10:31	12	Light air - 1 to 5 km/h	Quiet	red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		329211	5233265	77	288
6/15/2017	07:16:40	10	Light air - 1 to 5 km/h	Quiet	alder flycatcher	<i>Empidonax alnorum</i>	1	M	A				Yes		330582	5233382	90	244
6/15/2017	07:16:40	10	Light air - 1 to 5 km/h	Quiet	blue-headed vireo	<i>Vireo solitarius</i>	1	M	A				Yes		330582	5233382	46	275
6/15/2017	07:16:40	10	Light air - 1 to 5 km/h	Quiet	common yellowthroat	<i>Geothlypis trichas</i>	1	M	A				Yes		330582	5233382	61	116
6/15/2017	07:16:40	10	Light air - 1 to 5 km/h	Quiet	golden-crowned kinglet	<i>Regulus satrapa</i>	1	M	A				Yes		330582	5233382	20	313

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Survey Date	Survey Time	Temp	Wind	Noise	Common Name	Scientific Name	ObsCount	Sex	Age	Fly By	Seen	Calling	Singing	Incidental	Observer Easting	Observer Northing	Distance	Bearing
6/15/2017	07:16:40	10	Light air - 1 to 5 km/h	Quiet	magnolia warbler	<i>Setophaga magnolia</i>	1	M	A				Yes		330582	5233382	18	14
6/15/2017	07:16:40	10	Light air - 1 to 5 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		330582	5233382	45	291
6/15/2017	07:16:40	10	Light air - 1 to 5 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		330582	5233382	42	50
6/15/2017	07:16:40	10	Light air - 1 to 5 km/h	Quiet	northern waterthrush	<i>Parkesia noveboracensis</i>	1	M	A				Yes		330582	5233382	48	247
6/15/2017	07:16:40	10	Light air - 1 to 5 km/h	Quiet	northern waterthrush	<i>Parkesia noveboracensis</i>	1	M	A				Yes		330582	5233382	84	303
6/15/2017	07:16:40	10	Light air - 1 to 5 km/h	Quiet	yellow-bellied flycatcher	<i>Empidonax flaviventris</i>	1	M	A				Yes		330582	5233382	26	209
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	American robin	<i>Turdus migratorius</i>	1	U	U			Yes	Yes		331596	5233355	87	336
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	blue jay	<i>Cyanocitta cristata</i>	1	U	A			Yes		Yes	331596	5233355	112	349
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	cedar waxwing	<i>Bombcilla cedrorum</i>	1	U	U		Yes	Yes			331596	5233355	21	89
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	common raven	<i>Corvus corax</i>	1	U	U			Yes			331596	5233355	95	85
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	hermit thrush	<i>Catharus guttatus</i>	1	M	A				Yes		331596	5233355	78	357
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		331596	5233355	7	115
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		331596	5233355	45	290
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	northern parula	<i>Setophaga Americana</i>	1	M	A				Yes		331596	5233355	74	255
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		331596	5233355	73	147
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		331596	5233355	63	328
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		331596	5233355	32	15
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		331596	5233355	66	298
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		331596	5233355	94	183
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes		331596	5233355	87	36
6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		331596	5233355	94	5

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6/15/2017	05:55:03	7	Light air - 1 to 5 km/h	Quiet	yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	M	U						331596	5233355	93	275
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		American robin	<i>Turdus migratorius</i>	1	U	U			Yes			331098	5233407	75	73
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		blue jay	<i>Cyanocitta cristata</i>	1	M	A			Yes		Yes	331098	5233407	112	286
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		331098	5233407	22	66
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		Nashville warbler	<i>Oreothlypis ruficapilla</i>	1	M	A				Yes		331098	5233407	57	289
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		331098	5233407	66	127
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		palm warbler	<i>Setophaga palmarum</i>	1	M	A				Yes		331098	5233407	50	237
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		red-winged blackbird	<i>Agelaius phoeniceus</i>	1	M	U			Yes			331098	5233407	93	181
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		331098	5233407	54	189
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		331098	5233407	46	321
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		white-throated sparrow	<i>Zonotrichia albicollis</i>	1	M	A				Yes	Yes	331098	5233407	103	296
6/15/2017	06:25:27	9	Light air - 1 to 5 km/h		yellow-bellied flycatcher	<i>Empidonax flaviventris</i>	1	M	A				Yes		331098	5233407	42	274
6/15/2017	08:23:10	11	Light air - 1 to 5 km/h		black-and-white warbler	<i>Mniotilta varia</i>	1	M	A				Yes		330004	5233567	11	201
6/15/2017	08:23:10	11	Light air - 1 to 5 km/h		black-throated blue warbler	<i>Setophaga caerulescens</i>	1	M	A				Yes		330004	5233567	30	123
6/15/2017	08:23:10	11	Light air - 1 to 5 km/h		ovenbird	<i>Seiurus aurocapilla</i>	1	M	A				Yes		330004	5233567	57	74
6/15/2017	08:23:10	11	Light air - 1 to 5 km/h		purple finch	<i>Haemorhous purpureus</i>	1	M	A				Yes		330004	5233567	40	49
6/15/2017	08:23:10	11	Light air - 1 to 5 km/h		red-eyed vireo	<i>Vireo olivaceus</i>	1	M	A				Yes		330004	5233567	84	329
6/15/2017	08:23:10	11	Light air - 1 to 5 km/h		ruby-crowned kinglet	<i>Regulus calendula</i>	1	M	A				Yes		330004	5233567	96	290
6/15/2017	08:23:10	11	Light air - 1 to 5 km/h		Swainson's thrush	<i>Catharus ustulatus</i>	1	M	A				Yes		330004	5233567	36	15
6/15/2017	08:23:10	11	Light air - 1 to 5 km/h		winter wren	<i>Troglodytes hiemalis</i>	1	M	A				Yes		330004	5233567	61	114
6/15/2017	08:23:10	11	Light air - 1 to 5 km/h		yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	U	U						330004	5233567	18	43

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6/15/2017	08:23:10	11	Light air - 1 to 5 km/h		yellow-bellied sapsucker	<i>Sphyrapicus varius</i>	1	U	U						330004	5233567	87	303