ONTARIO BIRDS

The Journal of the Ontario Field Ornithologists
Volume 11 Number 3 December 1993

Ontario Field Ornithologists

Ontario Field Ornithologists is an organization dedicated to the study of birdlife in Ontario. It was formed to unify the ever-growing numbers of field ornithologists (birders/birdwatchers) across the province and to provide a forum for the exchange of ideas and information among its members. The Ontario Field Ornithologists officially oversees the activities of the Ontario Bird Records Committee (OBRC), publishes a newsletter and a journal, *Ontario Birds*, hosts field trips throughout Ontario and holds an Annual General Meeting in the autumn. Current President: Gerry Shemilt, 51 Montressor Drive, North York, Ontario M2P 1Z3.

All persons interested in bird study, regardless of their level of expertise, are invited to become members of the Ontario Field Ornithologists. Membership dues are $22.00 (Annual) or $400.00 (Life Membership). All members receive *Ontario Birds*. Please send memberships to: **Ontario Field Ornithologists, Box 62014, Burlington Mall Postal Outlet, Burlington, Ontario L7R 4K2.**

Ontario Birds

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The aim of *Ontario Birds* is to provide a vehicle for documentation of the birds of Ontario. We encourage the submission of full length articles and short notes on the status, distribution, identification, and behaviour of birds in Ontario, as well as location guides to significant Ontario birdwatching areas, book reviews, and similar material of interest on Ontario birds.

If possible, material submitted for publication should be double-spaced and typewritten. All submissions are subject to review and editing. Please submit items for publication to the Editors at the address noted above.

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President's Message

A new year has begun and may it be a happy, healthy and prosperous one for each of you. Some of you will be well into "winter lists", others starting their 1994 list and many looking, studying, enjoying and not keeping score. However you pursue this great pastime - may 1994 be a great year! Do we even dare think of another year like 1993? What a year!!

The Board of Directors is very happy and excited about the soon to be released "ORNITHOLOGY IN ONTARIO". This is a book that I am sure each of you will want to own. It is a history of ornithology in Ontario written by a number of authors and edited by Martin McNicholl and John Cranmer-Byng. Many people have been involved in this publication and will be acknowledged in the book. The person who has put it all together with deadlines that were promised and met, is Phill Holder. We are very grateful to Phill for his dynamic efforts on our behalf in getting this book published.

We hope to bring forth some new events this year. If any of the members have ideas or thoughts on what they would like to see OFO do please make them known to us. We will be happy to hear from you.

The subject of ethics keeps coming up. Some people have suggested that we adopt the ABA "Code of Ethics". Others have suggested the British system of local clubs looking after "crowd control" at a rare bird. The "Brits" also collect 1 or 2 pounds from each person attending, the money then being given to the host/hostess of the bird. Your Directors will be bringing forward a recommendation that we feel will be suitable for OFO members.

The three Editors of the Journal, Bill Crins, Ron Pittaway and Ron Tozer have done a great job on the publication. On behalf of the members, I would like to compliment them on a job well done! Thank you for getting the Journal back on track.

Please support the OBRC and send your field notes on rare sightings to the committee. This aids them in keeping up to date. The Ontario check list is going to be revised this year. With all the rarities in 1993, there are add-ons and revisions to be made.

Happy New Year and Good Birding.

Gerry Shemilt
President

Letter to the Editors

More on Common Nighthawk Migration

Peter Ewins' article in *Ontario Birds* 11 (2), regarding Common Nighthawks (*Chordeiles minor*) foraging in large flocks on migration on 23-24 August 1992, sent me scampering (strolling) for my 1992 diary.

While Ewins noticed, on the 24th, a flock of at least 110 Common Nighthawks foraging in a reasonably systematic fashion, we were seeing greater numbers! Our house, on the "old" bank of the Humber, has a view west and southwest over the Humber Valley. This location is approximately 3 km from Ewins' point of observation.

Our notes from Monday, 24 August, read as follows (in the inimitable fashion of diary shorthand):

"218 Humbercrest Blvd.":

> "at 6 p.m. to 7:30 p.m., a hot humid day, and sun finally came out - suddenly lots of nighthawks and gulls. Looking out into valley - almost like Niagara." (reference being to Adam Beck dam, when all the gulls in flight look like a feather pillow exploded)
>
> "1,000 plus ring-bills and herring gulls; 300+ nighthawks. The sky was filled. When the wind puffed; suddenly they'd all be over our house."

I also noted in this diary entry that Victoria questioned my judgement of 300+ nighthawks and thought easily 800+. Also, we noted that there must have been a hatch of some insect. Periodically, these insects were rising up over our house.

Whatever our counting abilities, it is apparent that this is a highly significant number of nighthawks. Unlike Ewins' observation, there seemed to be no systematic method of foraging. Most importantly though, this indicates that on 24 August 1992, a large number of nighthawks were in flight, and that this movement was occurring, at least in the west end of Toronto, on quite a broad front.

These initial observations were reported verbally at the September 1992 meeting of the Toronto Ornithological Club, and on reviewing the October 1992 newsletter of the TOC, it is also noted that ca. 450 were reported by Ray Geras (via Bob Yukich) at 6 Bernice Ave., Etobicoke. This is approximately 3 km almost due south of our observation point and about 4 km west-southwest of Ewins' observation point; further proof that a large movement of nighthawks occurred on 24 August 1992.

We are pleased that *Ontario Birds* publishes notes of this nature, and hope that our response may provoke others to look at their diaries for that day!

John R. Carley
Toronto, Ontario

Articles

Breeding Birds of Ontario: Nidiology and Distribution

Volume 1: Nonpasserines

(First Revision - Part B: Vultures to Phalaropes)

by
George K. Peck and Ross D. James

Breeding Bird Species

Turkey Vulture, *Cathartes aura*

71 nests representing 24 provincial regions. Nest records have more than doubled, primarily in southern Ontario, and suggest that the northward expansion of this species is continuing. Recent new nesting regions were Dufferin (1989), Essex (1988), Grenville (1991), Parry Sound (1992), Peterborough (1986), and Wellington (1992).

Several recent nests have been in or under deserted farm buildings.

INCUBATION PERIOD 1 nest, at least 36 days.

Osprey, *Pandion haliaetus*

893 nests representing 25 provincial regions. The huge increase in nest records was due primarily to the submission of 392 cards from the Lindsay district of the Ministry of Natural Resources. These cards covered the years from 1978-86 and were mainly from the counties of Northumberland, Peterborough and Victoria.

Bald Eagle, *Haliaeetus leucocephalus*

489 (837 nests) representing 21 provincial regions. Many records have come in from the Lake of the Woods and Red Lake/Lac Seul areas of Kenora District, where the species currently appears to be doing well. Early nest records have been obtained from Bruce (1937), Lambton (1947), and Nipissing (1929). A recent first nesting from Algoma (1986), and an active nest in Grey (1992) have been reported.

Outside diameters of 22 nests ranged from 0.8 to 3 m (2.5 to 10 ft), with 11 averaging 1.5 to 1.9 m (5 to 6.3 ft); inside diameters of 16 nests ranged from 0.5 to 1.2 m (1.5 to 4 ft), with 8 averaging 0.9 to 1.1 m (3 to 3.7 ft); outside depths of 19 nests ranged from 0.5 to 3 m (1.5 to 10 ft), with 9 averaging 0.9 to 1.2 m (3 to 4 ft). Nest measurements varied from year to year depending on the extent of additions and subtractions over the period of use.

INCUBATION PERIOD 1 nest, at least 36 days.

EGG DATES 27 nests, 26 February to 28 June (28 dates); 14 nests, 3 April to 28 April.

Breeding Distribution

In southwestern Ontario, along Lake Erie in Essex, Kent, Elgin, and Haldimand-Norfolk, the Bald Eagle had almost disappeared in the 1960s and 1970s. Only a few scattered pairs nested, mostly unsuccessfully, in Elgin, Essex and Kent during the 1970s, and by 1980 only three non-producing pairs remained in the area. Nest reports from Grey in the 1960s (Goodwin 1966; D. Linn, pers. comm.) were the only other breeding evidence from southern Ontario at this time. Since 1980, due to reestablishment efforts by the OMNR and others, the species is apparently making a slow recovery. By 1992, 11 nests produced 15 young in southern Ontario.

Northern Harrier, *Circus cyaneus*

252 nests representing 39 provincial regions. Nest records have been added from Haldimand-Norfolk (1988), Shagamu River in Kenora (1990), Lanark (historical - 1888), Manitoulin (1986), Muskoka (1954), Parry Sound (1985 - not 1986 as in Appendix A), Renfrew (1984), and south of Gogama in Sudbury (1992).

A 1992 nest from Winisk, Kenora District, had an outside diameter of 25.4 cm (10 inches) and an inside diameter of 15.2 cm (6 inches).

Figure 1: Adult Osprey at nest with small young. Unlike the Bald Eagle and some other raptors, the Osprey has shown continuous breeding success in Ontario. Photo by *G.K. Peck*.

Sharp-shinned Hawk, *Accipiter striatus*

79 nests representing 23 provincial regions. A 1977 nest record erroneously designated as Halton, was actually in Wellington. New nest records have been received from Brant (1989), Moosonee in Cochrane (1987), Elgin (1984), and Haldimand-Norfolk (1986). An early (1938) nest record from Keezhik Lake, Kenora District has come to light.

A rather small nest had an outside diameter of 40.6 cm (16 inches); inside diameter, 14 cm (5.5 inches); outside depth, 24.1 cm (9.5 inches); inside depth, 7 cm (2.8 inches).

EGGS 44 nests with 3 to 6 eggs; **3E** (5N), **4E** (16N), **5E** (22N), **6E** (1N)

Average clutch range 4 to 5 eggs (38 nests).

EGG DATES 43 nests, 30 April to 30 June (49 dates); 21 nests, 30 May to 8 June.

Cooper's Hawk, *Accipiter cooperii*

109 nests representing 29 provincial regions. Early nest records from Elgin (1950), and Northumberland (1902) have been acquired, as well as more recent nests in Haldimand-Norfolk (1985), Nipissing (1991), Oxford (1983), Victoria (1981), and Waterloo (1985).

Outside diameters of 4 nests ranged from 48.3 to 76 cm (19 to 29.9 inches); inside diameters of 5 nests ranged from 15.2 to 40.5 cm (6 to 16 inches); outside depths of 2 nests were 20.3 and 27.9 cm (8 and 11 inches); inside depths of 3 nests ranged from almost flat to 6.4 cm (2.5 inches).

EGGS 62 nests with 2 to 7 eggs; **2E** (3N), **3E** (22N), **4E** (19N), **5E** (17N), **7E** (1N).

Average clutch range 3 to 4 eggs (41 nests).

INCUBATION PERIOD 1 nest, ca 38 days.

EGG DATES 66 nests, 19 April to 8 July (80 dates); 33 nests, 15 May to 31 May.

Northern Goshawk, *Accipiter gentilis*

148 nests representing 29 provincial regions. In 1988 a nest in Haldimand-Norfolk, a nest record in Oxford (1992), plus other recent nests (see Appendix A, Volume 2, Peck and James 1987) indicate that this species continues to nest in southern Ontario despite decimation of many forested areas. Nest numbers have more than tripled in the past decade.

Outside diameters of 12 nests ranged from 43 to 106.5 cm (17 to 42 inches); inside diameters of 4 nests ranged from 23 to 53.5 cm (9 to 21 inches); outside depths of 5 nests ranged from 20 to 70 cm (7.9 to 27.6 inches); inside depths of 2 nests were both 7.6 cm (3 inches).

EGGS 61 nests with 1 to 5 eggs; 1E (2N), **2E** (10N), **3E** (40N), **4E** (10N), **5E** (1N).

Average clutch range 3 eggs (40 nests).

INCUBATION PERIOD 1 nest, at least 36 days.

EGG DATES 43 nests, 1 April to 10 June (51 dates); 22 nests, 25 April to 6 May.

Red-shouldered Hawk, *Buteo lineatus*

389 nests representing 34 provincial regions. Old nest records have been added from Elgin (pre-1936), Essex (pre-1936), Haliburton (1941), Hastings (1912), Prescott (1966), and Timiskaming (1956). Recent nests were reported from Haldimand-Norfolk (1985), Manitoulin (1989), and Nipissing (1990).

Broad-winged Hawk, *Buteo platypterus*

188 nests representing 33 provincial regions. Additional nest records have been acquired from Elgin (1984) and Haldimand-Norfolk (1976) in southwestern Ontario where this hawk is not a common breeding species.

Red-tailed Hawk, *Buteo jamaicensis*

1030 nests representing 42 provincial regions. Recently nests have been reported from Haliburton (1989), and near Gogama in Sudbury (1987).

Rough-legged Hawk, *Buteo lagopus*

6 nests representing 1 provincial region.

One nest had an outside diameter of 65 cm (26 inches); inside diameter, 25 cm (9.8 inches); outside depth, 50 cm (19.7 inches); inside depth, 3 cm (1.2 inches).

Golden Eagle, *Aquila chrysaetos*

8 nests representing 1 provincial region. In 1981 at a new site near Kiruna Lake, Kenora, 2 unoccupied nests were found, near each other on a rock face. The eighth provincial record was at Sutton Gorge, Kenora in 1991, where the site has been at least intermittently occupied since the 1950s.

Three nests had outside diameters ranging from 150 to 200 cm (59 to 78.7 inches); outside depths, 30 to 300 cm (11.8 to 118 inches).

American Kestrel, *Falco sparverius*

341 nests representing 41 provincial regions. Recently added nesting regions were Bruce (1982) and Waterloo (1985).

Merlin, *Falco columbarius*

81 nests representing 11 provincial regions. Nests have been reported from Ekwan Point in Kenora (1990), north of Sudbury in Sudbury District (1984), and near Gogama also in Sudbury (1991).

Outside diameters of 5 nests ranged from 30.5 to 89 cm (12 to 35 inches); outside depths of 4 nests, 12.5 to 30 cm (4.9 to 11.8 inches); inside diameters of 2 nests were 25 to 26.7 cm (9.8 to 10.5 inches); inside depths of 2 nests were 3.8 and 5 cm (1.5 and 2 inches).

EGGS 39 nests with 1 to 5 eggs; 1E (2N), 2E (1N). **3E** (8N). **4E** (14N), **5E** (14N).

Average clutch range 4 to 5 eggs (28 nests).

EGG DATES 30 nests, 16 May to 5 July (33 dates); 15 nests, 30 May to 15 June.

Peregrine Falcon, *Falco peregrinus*

66 nests representing 13 provincial regions. Recently more historic breeding and active nest records have come to light. Nests were at Eugenia Falls (1940) and Kimberley (1930) in Grey; Diamond Lake (1957) in Hastings; South Lake (1938) in Leeds; Elk Lake (1936) in Muskoka; Hogan Lake (1910) in Nipissing; Clear Lake (1937) in Renfrew; and the earliest provincial nest was at St. Ignace Island (1849) in Thunder Bay. New regional breeding records without nest data were from Bon Echo Lake in Lennox and Addington and from Scarborough Bluffs in York.

All nests were on cliffs except the 1983 nest of a released pair at Arnprior in Renfrew, which was on a church tower.

EGGS 35 nests with 2 to 5 eggs; 2E (7N), **3E** (8N), **4E** (18N), **5E** (2N).

Average clutch range 4 eggs (18 nests).

EGG DATES 29 nests, 29 April to 12 June (33 dates); 15 nests, 1 May to 20 May.

Gray Partridge, *Perdix perdix*
18 nests representing 9 provincial regions. Old nest records have been obtained from Glengarry (1958) and Wellington (1960).

Willow Ptarmigan, *Lagopus lagopus*
30 nests representing 1 provincial region. In 1990, 2 nests were found near the mouth of the Little Shagamu River, Kenora, and in 1991 near the mouth of the Brant River, Kenora, 6 nests were found.
EGGS 30 nests with 1 to 12 eggs; 1E (2N), 2E (2N), 4E (2N), **5E** (2N), **6E** (3N), **7E** (6N), **8E** (6N), **9E** (5N), **11E** (1N), 12E (1N).
Average clutch range 7 to 9 eggs (17 nests).
EGG DATES 30 nests, 8 June to 17 July (37 dates); 15 nests, 26 June to 14 July.

Ruffed Grouse, *Bonasa umbellus*
344 nests representing 45 provincial regions. In Appendix A, Volume 2, we stated that our breeding record for Prescott County was an error. We now have a 1966 nest record from Prescott.

Sharp-tailed Grouse, *Tympanuchus phasianellus*
2 nests representing 2 provincial regions. An adult with 6 young at Winisk, Kenora (1984), was the first breeding record for the north coast (Weir 1984), and other northern breeding records (see Appendix A) have been noted. The Twin Falls record in Appendix A was on the Abitibi River and not the Albany. A recent breeding record (adult with 8 young) was reported in 1993 from Gore Bay, Manitoulin (Bailey, pers. comm.).

Wild Turkey, *Meleagris gallopavo*
11 nests representing 5 provincial regions. A 1972 nest record from Simcoe County, and 7 nests from Haldimand-Norfolk (1984), have been added. All these nests are from released birds, which in a few areas are reported to be currently expanding.
EGGS 8 nests, 10 to 14 eggs; 10E (1N), 12E (3N), 13E (1N), **14E** (3N).
EGG DATES 9 nests, 7 May to 11 August.

Northern Bobwhite, *Colinus virginianus*
15 nests representing 4 provincial regions. Breeding records have been reported from Haldimand-Norfolk (1972), and Middlesex (1986).

Yellow Rail, *Coturnicops noveboracensis*
4 nests representing 4 provincial regions. On 29 May 1982 the fourth Ontario nest, containing 6 eggs, was found near Richmond, Ottawa-Carleton. The nest was located in a fen and situated in a clump of dried grasses.
EGG DATES 4 nests, 29 May to 30 June.

King Rail, *Rallus elegans*
14 nests representing 6 provincial regions. An early nest record from Middlesex (1942), and a breeding record from Grey (1987) have been obtained.

Virginia Rail, *Rallus limicola*
213 nests representing 28 provincial regions. The Lennox & Addington and Renfrew records reported in Appendix A were breeding records. A nest record has been added from Waterloo (1986).

Sora, *Porzana carolina*
250 nests representing 31 provincial regions. Nest records from Bruce (1984) and Welland (1962) have been added.

More incubation periods (2 nests of ca 20 days, 1 of at least 19 days) have been reported. Because incubation commences before clutch completion, many erroneous periods have been reported in the literature for this species (Nice 1954).

Common Moorhen, *Gallinula chloropus*
491 nests representing 25 provincial regions. An early (1938) nest record for Bruce County, and a 1962 nest in Welland County have been added for this southern Ontario breeding species.

American Coot, *Fulica americana*
451 (462 nests) representing 19 provincial regions. The nesting record for Oxford County referred to in Appendix A was actually a breeding record. Bruce (1938), Essex (1982), and Welland (1969) are

Figure 2: Virginia Rail at nest in marsh near Lake St. Clair, Kent County, in extreme southwestern Ontario. Photo by *G.K. Peck*.

recently added nest records.

The largest egg clutches (12 to 18 eggs) may be the product of 2 or more females.

Sandhill Crane, *Grus canadensis*

8 nests representing 3 provincial regions. In the past decade a nest near Cochrane in Cochrane District (1983), 2 nests near Winisk in Kenora (1992), and a nest near Sandfield in Manitoulin District (1982) have been added to the ONRS files. Breeding records from Spohn Tp. in Rainy River (1989), Russell (1988), Nakina in Thunder Bay (1992), and Waterloo (1992) have been received. A report, as yet not in ONRS files, of nesting and breeding in southern Algoma in 1978-9 (Tebbel and Ankney 1982), has been published.

One nest was on a mat of vegetation over a floating bog, another was raised 12.7 cm (5 inches) above water, and a third was in leatherleaf above water with a depth of 15.2 to 30.5 cm (6 to 12 inches). One nest was described as very flat. Outside diameter of 1 nest was 122 cm (48 inches); inside diameter, 76 cm (29.9 inches); outside depth, 30 cm (11.8 inches); inside depth, 29 cm (11.4 inches).

EGGS 6 nests, each with 2 eggs.

EGG DATES 7 nests, 7 May to 12 June.

American Golden-Plover (Lesser Golden-Plover), *Pluvialis dominica*

6 nests representing 1 provincial region. Since 1978 there have been 4 more nests found near Radar Site 415, Polar Bear Provincial Park, Kenora. The nests were on dry, heath/lichen tundra, and each contained 4 eggs.

Inside diameters of 5 nests ranged from 10 to 12.5 cm (3.9 to 4.9 inches); inside depths of 3 nests ranged from 4 to 5 cm (1.6 to 2 inches).

EGG DATES 6 nests, 23 June to 8 July.

Semipalmated Plover, *Charadrius semipalmatus*

47 nests representing 2 provincial regions and an island in James Bay (NWT). An historical record (1860) of a nest at Moosonee, Cochrane District (Todd 1963) has come to light, and nests were recently found near the mouths of the Brant (1991) and Shagamu (1990) Rivers, both in Kenora District. Since nest records have more than doubled, additional new data is summarized below.

Outside diameters of 5 nests ranged from 9 to 11 cm (3.5 to 4.3 inches); inside diameters of 9 nests ranged from 6.5 to 9.9 cm (2.6 to 3.9 inches); inside depth of 1 nest was 1 cm (0.4 inches).

EGGS 40 nests, 1 to 4 eggs; 1E (1N), 2E (1N), **3E** (6N), **4E** (32N).

Average clutch range 4 eggs (32 nests).

EGG DATES 43 nests, 4 June to 30 July (57 dates); 22 nests, 22 June to 1 July.

Breeding Distribution

Although it was stated in Volume 1 (Peck and James 1983) that breeding was first substantiated in 1947 and that the first nests were found in 1948, nests were actually found at the mouth of the Moose River (1860), at Fort Severn (1940), Cockispenny Point (1942), at the mouth of the Kabiskaubakau River (1942), and Big Piskwamish Point (1947).

Piping Plover, *Charadrius melodus*

120 (121 nests) representing 12 provincial regions. An early (1934) nest record from Wentworth has been added. No nests have been reported since 1987 when 2 nests each with 4 eggs and 2 empty scrapes were located on Sable Island, Lake of the Woods, Rainy River District.

Killdeer, *Charadrius vociferus*

1356 nests representing 48 provincial regions. New nests along our provincial coasts were at Longridge Point in Cochrane (1991), and at Ekwan Point (1990) and the mouth of the Shagamu River (1990), both in Kenora.

Lesser Yellowlegs, *Tringa flavipes*

3 nests representing 1 provincial region. The first Ontario nest (1938) has now been discredited (James 1992), and the actual first nest is the one found in 1990 at the mouth of the Shagamu River, Kenora. In 1992, the second and third provincial nests were found near Winisk, Kenora. Thus all records, including the 1940 breeding record (collection of flightless young) at Fort Severn in Kenora, are near the Hudson Bay coast.

The 3 nests were in open black spruce ridge areas with a lichen ground cover. All nests were depressions in the lichen, and 1 was at the base of a small tamarack, and another at the base of a burnt spruce. Two of the nests were in a recent burn.

EGGS 3 nests, each with 4 eggs.

EGG DATES 3 nests, 9 June, 9 June, 23 June.

Spotted Sandpiper, *Actitis macularia*

749 nests representing 46 provincial regions. Nests were reported from the Little Abitibi River in Cochrane (1985), and the mouth of the Shagamu River in Kenora (1990).

Upland Sandpiper, *Bartramia longicauda*

62 nests representing 20 provincial regions.

EGGS 55 nests with 1 to 4 eggs; 1E (1N), 2E (2N), **3E** (7N), **4E** (45N).

Average clutch range 4 eggs (45 nests).

INCUBATION PERIOD 3 nests: 1 of 20 days, 1 of 21 days, 1 of at least 21 days.

Eggs were laid at daily intervals.

EGG DATES 53 nests, 7 May to 9 July (72 dates); 26 nests, 28 May to 8 June.

Whimbrel, *Numenius phaeopus*

10 nests representing 1 provincial region. In 1990, 3 nests were found just east of the mouth of the Little Shagamu River, Kenora.

Nests were depressions on the ground, usually on hummocks and in grasses or moss. Nest materials, if any, were of dead sedge stalks and coarse grasses. Nests were unlined or were sparsely lined with fine grass stems and a few leaves.

EGGS 9 nests with 2 to 4 eggs; 2E (2N), 3E (2N), **4E** (5N).

Average clutch range 4 eggs (5 nests).

EGG DATES 10 nests, 8 June to 17 July (13 dates); 5 nests, 26 June to 28 June.

Hudsonian Godwit, *Limosa haemastica*

1 nest representing 1 provincial region. On 10 June 1992 the first Ontario nest containing 1 egg was found and photographed near Winisk, Kenora (55° 28'N & 85° 46'W) by G. Moraal during a MNR goose survey.

The nest was located in a wet, grassy meadow with a few tamarack trees. The nest was a circular depression in moss and grass.

Semipalmated Sandpiper, *Calidris pusilla*

16 nests representing 1 provincial region. A nest was found on Cape Henrietta Maria in 1985, and 3 others near the mouth of the Brant River in 1991, in Kenora District.

EGGS 16 nests with 3 to 4 eggs; 3E (3N), **4E** (13N).

Average clutch range 4 eggs (13 nests).

EGG DATES 16 nests, 12 June to 2 July (19 dates); 8 nests, 24 June to 29 June.

Least Sandpiper, *Calidris minutilla*

9 nests representing 1 provincial region. A nest was found near the mouth of the Brant River, Kenora, in 1991.

EGGS 9 nests with 3 to 4 eggs; 3E (3N), **4E** (6N).

Average clutch range 4 eggs (6 nests).

INCUBATION PERIOD 1 nest, 19 days.

EGG DATES 9 nests, 19 June to 21 July (10 dates); 5 nests, 26 June to 1 July.

Dunlin, *Calidris alpina*

10 nests representing 1 provincial region. Recent nests were on the coast just southwest of East Pen Island, and near the mouth of the Brant River, both in Kenora.

Outside diameter of 1 nest was 9 cm (3.5 inches), and it was situated on a sedge hummock that had a diameter of 40 cm (15.7 inches).

EGGS 8 nests with 2 to 5 eggs; **2E** (1N), **4E** (6N), **5E** (1N).

Average clutch range 4 eggs (6 nests).

The 5 egg clutch was most unusual (Cramp and Simmons 1983), and may or may not have been the product of more than 1 female; it was being incubated.

EGG DATES 9 nests, 13 June to 21 July (13 dates); 5 nests, 25 June to 27 June.

Stilt Sandpiper, *Calidris himantopus*

An undocumented first nest of this species found by R.I.G. Morrison on 20 June 1976 near radar site 415, Kenora District, has been reported (Cadman *et al.* 1987). Confirming detailed data of this record has been requested by the ONRS, but has yet to be received.

Short-billed Dowitcher, *Limnodromus griseus*

1 nest representing 1 provincial region. On 10 June 1992 the first Ontario nest containing 4 eggs was found and photographed near Winisk, Kenora (55° 27'N & 85° 47'W) by G.J. Soulliere during a MNR goose survey (see page 109).

The nest was in a wet, open fen between spruce ridges, and was placed on a sedge hummock having a height of 0.3 m (1 ft). The nest was formed entirely of sedge stalks.

Common Snipe, *Gallinago gallinago*

88 nests representing 29 provincial regions. Recent new nestings were reported from Huron (1989), north of Ekwan Point in Kenora (1990), and near Winisk in Kenora (1992).

Outside diameters of 3 nests ranged from 12 to 15.2 cm (4.7 to 6 inches); inside diameters of 7 nests ranged from 9 to 13.5 cm (3.5 to 5.3 inches); outside depth of 1 nest was 5 cm (2 inches); and inside depths of 4 nests ranged from 3 to 7.6 cm (1.2 to 3 inches).

EGGS 81 nests with 1 to 4 eggs; 1E (2N), 2E (2N), **3E** (7N), **4E** (70N).

Average clutch range 4 eggs (70 nests).

INCUBATION PERIOD 1 nest, 19 days.

EGG DATES 80 nests, 24 April to 26 July (91 dates); 40 nests, 22 May to 14 June. All late egg dates (July) were from northern Ontario nests.

American Woodcock, *Scolopax minor*

290 nests representing 41 provincial regions. The most northerly Ontario nest was found in 1981 at Little Abitibi Lake, Cochrane (49° 24'N & 80° 33'W). Other nest additions were from Manitoulin (1988) and Muskoka (1983).

Outside diameters of 3 nests ranged from 10 to 14 cm (3.9 to 5.5 inches); inside diameter of 1 nest was 10 cm (3.9 inches); and inside depth of 1 nest was 2 cm (0.8 inches).

INCUBATION PERIOD 3 nests: 1 of at least 20 days, 2 ca 20 to 21 days. Eggs were laid at daily intervals.

Wilson's Phalarope, *Phalaropus tricolor*

56 nests representing 11 provincial regions. Nest numbers have more than tripled in the decade, due in large part to the delayed contribution in 1984 of 32 cards by V.L. Sinclair from North Point and Big Piskwamish Point, Cochrane, covering the years 1976—7.

EGGS 50 nests with 1 to 5 eggs; 1E (1N), **3E** (7N), **4E** (42N), 5E (1N).

The 5 egg clutch is highly unusual.

Average clutch range 4 eggs (42 nests).

EGG DATES 51 nests, 18 May to 4 July (67 dates); 25 nests, 4 June to 14 June. Eggs were usually laid at daily intervals.

Red-necked Phalarope, *Phalaropus lobatus*

7 nests representing 1 provincial region. Nests found at Radar Site 415 (1984) and on Cape Henrietta Maria (1985) (see Appendix A) in Kenora, provided some of the following information.

Inside diameter of 1 nest was 7 cm (2.8 inches); inside depth, 3.5 cm (1.4 inches).

EGGS 7 nests, each with 4 eggs.

EGG DATES 7 nests, 22 June to 4 July (10 dates).

Figure 3: A Short-billed Dowitcher incubating four eggs. The first provincial nest of this species was located near Hudson Bay, Kenora District, in 1992. Photo by *G.K. Peck.*

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Some Notes on the Breeding Birds of Lake Nipigon, Thunder Bay District, Ontario

by

Nicholas G. Escott and Susan Bryan

Little is known about the birds that nest on Lake Nipigon, its islands and shores. The only systematic study was done by L.L. Snyder in the summers of 1923 and 1924 (Snyder 1928). The present study was undertaken, in part, to obtain data for the Ontario Rare Breeding Bird Program.

Six volunteer birders chartered a diesel cruiser out of Orient Bay for a five-day period in each of two consecutive summers: 16-21 June 1991 and 5-10 July 1992. During these two trips we circumnavigated the lake, visited the islands in the centre of the lake, and checked all the major bays and rivermouths. Much of our time was spent on board, and the water, shores and islands were constantly scanned with binoculars. Nesting islands and other interesting sites, such as rivermouths and sand beaches, were approached more closely by outboard motor boats, permitting landing in many of these areas.

We recorded 107 species of birds during our two trips; this compares to 97 species found by Snyder during his two summers on the lake. The status of many of these species remains unchanged. Some species, however, appear to have changed in abundance. Several of these species are discussed in the following

annotated list. A few of the species recorded were considered migrants only, although two of these (Rusty Blackbird and Greater Yellowlegs) are known to nest in the general vicinity of Lake Nipigon. A complete listing of the species observed has been published elsewhere (Escott 1991, Bryan 1994).

Annotated List:

The species listed below have, in our opinion, definitely or probably changed in abundance since the 1920's. The order used is that of the American Ornithologists' Union (1983) checklist. In addition to our findings, including any evidence of nesting, we have included reference to Snyder's experience with each species.

Common Loon (*Gavia immer*).
This was a common species, with over 500 counted. They were single, in pairs, or in groups of up to thirty birds. Many were fishing far from shore and were likely non-breeders. A nest containing one adult and at least one tiny chick was found on 5 July 1992 at Rhea Lake, a small inland lake on the east side of Shakespeare Island. Snyder had found this species uncommon, with only singles or pairs at widely separated points.

American White Pelican (*Pelecanus erythrorhynchos*).
Thirty were seen in 1991, and forty-four in 1992. Nesting colonies were found on small islands in opposite corners of the lake. In 1991, three nests were found on Pretty Island, McIntyre Bay, two of which each had two eggs; one was empty. In 1992, two nesting colonies were found on small islands a half mile apart, west of Ombabika Narrows. The first colony held ten nests, six containing two eggs and four containing one egg. The second colony held four nests, three containing two eggs and one with a single egg. This species was not recorded by Snyder; nesting on Lake Nipigon represents an eastern range extension (Bryan 1991).

Double-crested Cormorant (*Phalacrocorax auritus*).
This species was abundant, with over 5,000 individuals counted. Fifteen nesting colonies were found, with an estimated 2,500 nests, mostly in the northern half of the lake. This species appears to have increased explosively. Snyder found only one nesting colony of this species (Ontario's first) in Lake Nipigon, and our guide, Mr. Odorizzi, knew of only one nesting colony when he first started travelling Lake Nipigon in 1955.

Great Blue Heron (*Ardea herodias*).
This was a common species, seen daily, with over 220 birds counted. Eleven breeding colonies were found with over sixty nests seen (other nests were almost certainly present, but hidden by foliage in the nesting trees). Remarkably, Snyder does not list this species at all!

Canada Goose (*Branta canadensis*).
This species was seen on both trips, a total of fifty-eight adult birds being counted. While we saw no evidence of nesting, MNR personnel had seen goslings on the lake in 1991. Snyder did not observe this species; its presence on Lake Nipigon may be secondary to reintroduction programs in Thunder Bay, and perhaps elsewhere.

American Black Duck (*Anas rubripes*).
Snyder saw only one of this species; we saw fourteen, all but two of them on Lake Nipigon itself. We found no evidence of nesting.

Mallard (*Anas platyrhynchos*).
This species was seen daily both summers, with over eighty-five adults present. A female with six downy young was at the mouth of the Ombabika River 20 June 1991. Snyder saw only four adult birds in two summers, but obtained evidence of breeding (a female with two downy young).

Blue-winged Teal (*Anas discors*).
We saw this species both years, a total of six individuals, all males except for a female in a pair at Windigo Bay 18 June 1991. This species was not seen by Snyder.

American Wigeon (*Anas americana*).
This species was also seen both summers, a total of seven birds, without evidence of nesting. Snyder did not record this species.

Ring-necked Duck (*Aythya collaris*).
This was a fairly common species, with over forty birds seen. The majority were in a flock of males south-east of the Onaman River mouth. Nesting was strongly suspected in several areas, due to the extensive suitable habitat, although it could not be confirmed. Snyder did not record this duck, as his study preceded the eastward expansion of this species which began in the 1930's (McNicol 1987).

Turkey Vulture (*Cathartes aura*).
This species was seen on both trips, a total of ten individuals, most on the west side of the lake. A pair was seen landing in cliff-top trees in Gull Bay 18 June 1991; a nest may have been nearby. This species is expanding its range in Thunder Bay District; as recently as 1981-85, none was seen in any of the four 100-km squares bordering Lake Nipigon during the Ontario Breeding Bird Atlas (Cadman 1987). Not unexpectedly, Snyder does not list this species.

Bald Eagle (*Haliaeetus leucocephalus*).
This was the most common raptor, with sightings every day, for a total of over one hundred birds. Ten nests were found, four of them with fledglings visible. Nests were in tall trembling aspens (*Populus tremuloides*), except for one on Cattail Islands in a large birch (*Betula papyrifera*). Snyder saw only three eagles, and was aware of only two nests.

American Kestrel (*Falco sparverius*).
We saw only seven, four of them in the disturbed area around the settlement of Orient Bay. Few were seen around the perimeter of the lake, due to lack of suitable habitat. American Kestrels are abundant in clear-cut logged areas in northwestern Ontario, but we found no logged areas along the Lake Nipigon shoreline. Snyder found this species fairly common, perhaps because human habitations and clearings were more widespread at that time.

Peregrine Falcon (*Falco peregrinus*).
One adult bird was seen 6 July 1992 preying on nestlings at a Ring-billed Gull colony on the Tichnor Islands at the mouth of Humbolt Bay. This bird did not have any leg bands, and so could not be definitely traced to any of the Peregrine Falcon release programs along the Lake Superior shores of Ontario, Minnesota, and Michigan (Isle Royale). There was no evidence of nesting, although suitable habitat, in the form of vertical cliffs, was present. Snyder did not observe this species.

Killdeer (*Charadrius vociferus*).
We saw only four individuals of this species, in scattered locations. Snyder found a pair on many of the sandy beaches he visited; the beaches we walked were deserted.

Bonaparte's Gull (*Larus philadelphia*).
This species was fairly common and seen on both trips, with forty-eight individuals counted, in several areas, usually in small flocks. No evidence of nesting was seen, although this species is known to breed on smaller inland lakes nearby. It is likely that some of the birds we saw were nesting birds. This species was not noted by Snyder.

Ring-billed Gull (*Larus delawarensis*).
This common gull was seen daily, with a total of over 1,500 birds seen, in all parts of the lake. Three nesting colonies were found, on small low-lying rocks, holding approximately eighty, sixty, and one hundred and twenty nests. The Ring-billed Gull was not seen by Snyder.

Herring Gull (*Larus argentatus*).
While this species was fairly common in the 1920's, it is now the most abundant species on Lake Nipigon. Snyder found only four nesting colonies in his travels around the lake, one of which had twenty-five nests. We found Herring Gulls nesting on practically every island and islet, in all parts of the lake.

Common Tern (*Sterna hirundo*).
We only encountered this species twice. A flock of about forty was seen with Black Terns several hundred metres off shore on 19 June 1991; and two adults were seen perched on stumps at the Little Jackfish River mouth at the north end of Ombabika Bay, in 1992. No evidence of nesting was found. This species was not seen by Snyder during his two summers on the lake.

Black Tern (*Chlidonias niger*).
Nineteen Black Terns were mixed in with the Common Tern flock in 1991. No Black Terns, however, were seen at any of the grassy river mouths, and a nesting site was not found. This may have been a transient flock. Snyder did not report this species.

Downy Woodpecker (*Picoides pubescens*).
We encountered this species much less frequently than Snyder did. While he found it the most common woodpecker of the region in the 1920's, we observed only two individuals.

Olive-sided Flycatcher (*Contopus borealis*).
We heard only one individual of this species during both expeditions. Snyder found it well distributed in black spruce country, which is the typical vegetation around much of the northern half of the lake.

Yellow-bellied Flycatcher (*Empidonax flaviventris*).
This species is another denizen of black spruce country, which we encountered only once. Snyder found them to be not common, but well distributed throughout the region.

Least Flycatcher (*Empidonax minimus*).
We found this species only at the Orient Bay settlement, with one or two found here each year. Snyder, however, found this to be the most common representative of its family, and found it in all suitable localities visited.

Bank Swallow (*Riparia riparia*).
A large colony was found nesting in the sandy bank just north of the Whitesand River, with at least sixty nest holes. Over one hundred birds were seen here; also two individuals at Gull Bay. Snyder did not record this species; the only swallow species he saw was Tree Swallow.

Cliff Swallow (*Hirundo pyrrhonota*).
A breeding colony with at least five nests was present both years around the buildings in Orient Bay.

Barn Swallow (*Hirundo rustica*).
These were seen both years around the buildings at Orient Bay, (maximum six birds in 1991).

Common Raven (*Corvus corax*).
This species was common, with almost 200 birds counted. They were seen every day, and three nests were found, two on cliff ledges and one, containing three large young, was in a large trembling aspen on the east shore of Rhea Lake, Shakespeare Island on 9 July 1992. Interestingly, Snyder's only observation of this species was of a group of six on 27 June 1924, and he states that they were not known by residents of the region.

Sedge Wren (*Cistothorus platensis*).
Two singing males were found on opposite sides of the lake. One was at the mouth of the Kabitotikwia River on 18 June 1991, and one was at the Onaman River mouth on 6 July 1992. This is close to the northern edge of its breeding range. Snyder did not record this species.

Ruby-crowned Kinglet (*Regulus calendula*).
We found this species fairly common and well-distributed, with twenty-one counted. Snyder, in contrast, found only one in two summers of field work.

European Starling (*Sturnus vulgaris*).
Only four were seen, all at the Orient Bay settlement. None was seen in uninhabited areas. Snyder did not report this species at all in the 1920's. It was not recorded in Thunder Bay District until the 1930's (Dear 1940).

Philadelphia Vireo (*Vireo philadelphica*).
We did not encounter this species at all; Snyder, however, thought it to be almost as common as the Red-eyed Vireo, based on the number of occasions in which it was positively identified.

Northern Parula (*Parula americana*).
Seven singing males were found at widely scattered locations, in heavy mixed woods along river banks or bays. Snyder did not record this species.

Yellow Warbler (*Dendroica petechia*).
This species was unexpectedly common, not only in willow thickets near river mouths, but also on small wooded islets, particularly at the north end of the lake. Some of these islets had scattered tall mature trees only. One bird was on the tiny rocky islet where one of the White Pelican nesting colonies was found. Snyder found this warbler uncommon and restricted to alder and willow flats, the habitat with which it is usually associated in the rest of Thunder Bay District.

Cape May Warbler (*Dendroica tigrina*).
Unlike Snyder, who found only one bird of this species in two summers, we found them to be common in cool spruce woods, with thirty-two counted.

Yellow-rumped Warbler (*Dendroica coronata*).
We found this species common and generally distributed, with seventy-five birds counted. Snyder states that this species was not common in the region as a whole, but in one or two localities it was seen in some numbers.

Black-and-white Warbler (*Mniotilta varia*).
We found only ten singing males of this species, in richer mixed and diciduous woods, at several locations. Snyder found it common in many locations.

Mourning Warbler (*Oporornis philadelphia*).
We found only four individuals of this species, near roadsides and clearings around Orient Bay. Snyder also found this species in clearings, but was surprised at how common they were, and he collected nine specimens.

Common Yellowthroat (*Geothlypis trichas*).
Nine different birds were found, in grassy river mouth marshes, and grassy stream edges, in various parts of the lake. Snyder did not record this species.

Canada Warbler (*Wilsonia canadensis*).
Only five birds of this species were heard singing. Snyder found it common in his survey.

Chipping Sparrow (*Spizella passerina*).
This species was common, in all types of habitat, with about forty birds counted. Many of them were around human habitations at Orient Bay, similar to the distribution of this species in the 1920's. In addition, however, we found many Chipping Sparrows in various natural habitats around the lakeshore.

Le Conte's Sparrow (*Ammodramus leconteii*).
Colonies were found in the extensive grass and sedge marshes at the mouth of the Kabitotikwia River, Gull Bay, in 1991 (five singing males), and at the mouth of a creek entering Humbolt Bay just south of the Onaman River, in 1992 (seven singing males). Snyder did not note this species, although he did search for them. He did not, however, visit the sites where we found them.

Bobolink (*Dolichonyx oryzivorus*).
Two territorial males were singing and displaying in the grassy marshes at the mouth of the Kabitotikwia River on 18 June 1991. Snyder did not record this species.

Red-winged Blackbird (*Agelaius phoenicius*).
We found this species locally common in large grassy marshes, with thirty at McCann Creek, fifteen at the mouth of the Kabitotikwia River, twenty-five at the Onaman River mouth, and fifteen at Shadow Creek near Orient Bay. Snyder lists this species as an uncommon summer resident, and en-

countered only one breeding pair (at Humboldt Bay), and a male (on the northwest shore of Ombabika Bay). At Humboldt Bay, he states that this was the only pair to occupy a reedy bay covering perhaps 100 acres.

Common Grackle (*Quiscalus quiscula*).
We saw several Grackles near Orient Bay, and an individual on Ells Island near an old commercial fishing camp. While Snyder saw this species in early June, he considered it a migrant, and did not see any at all during the breeding season.

White-winged Crossbill (*Loxia leucoptera*).
Small flocks were seen on both trips, a total of over seventy birds. These appeared to be transient flocks; there was no evidence of nesting. Snyder saw no crossbills of either species.

Evening Grosbeak (*Coccothraustes vespertinus*).
Over 120 Evening Grosbeaks were seen, on both trips. They were mostly in small flocks and many were around the clearings and buildings of Orient Bay. Others were seen at various locations on the lakeshore. Snyder saw none during his two summers on the lake.

Conclusions

There appears to be an increased diversity of bird species on Lake Nipigon now compared to the 1920's, since we recorded 107 species and Snyder recorded 97; this increase is despite the fact that Snyder spent two entire summers on the lake versus our two weeks.

The most striking change over the sixty-seven year interval is a marked increase in the numbers and diversity of colonial water birds. Great Blue Heron and Ring-billed Gull were not present on the lake in the 1920's. Loons, ducks, and Herring Gulls have increased. Double-crested Cormorant numbers have increased explosively. American White Pelicans are a recently arrived species on Lake Nipigon, with the first sightings in 1979. The discovery of nesting colonies in 1991 and 1992 established a significant eastward extension of their breeding range (Bryan 1991).

There have also been increases in large raptors, including Bald Eagles and Turkey Vultures. There appears to be an increase in the number and variety of swallow species; other species that have increased significantly are Common Raven and Evening Grosbeak.

It is more difficult to interpret the significance of the species which appear to have decreased in numbers. Some of these, such as the American Kestrel and the Mourning Warbler, are associated with clearings and disturbed areas, which were much more extensive on the shores of Lake Nipigon in the 1920's. We encountered these species on fewer occasions due to the reduction in the extent of their preferred habitat.

Other forest species, such as grouse and owls, were seen much less frequently by us, probably due to the fact that we spent much less time on land than Snyder did. Snyder made his observations over two entire summers, and spent most of his time on land, sleeping overnight in base camps, and exploring the countryside up to five miles inland from the lakeshore. We, however, restricted our terrestrial birding to the immediate shores of the lake, and spent most of our time, including nights, on board the cruiser.

Acknowledgements

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Observation of a Northern Harrier eating eggs

by
Ross D. James

The food habits of Northern Harriers (or Hen Harriers, *Circus cyaneus*), have been studied by numerous workers. However, the North American literature is virtually devoid of any reference to them eating eggs (Bent 1937, Hammerstrom 1986, Sherrod 1978, Palmer 1988, Johnsgard 1990). While egg eating is mentioned in European literature, references are very few, and generally without any specific details, so that the extent or even the existence of such behaviour is far from clear. Witherby *et al.* (1943), without comment or source, include the eggs or young of ground nesting birds among the list of items eaten. Stephen (1967) concurred, but considered this exceptional behaviour "forced" upon them by food scarcity. Watson (1977) and Cramp and Simmons (1980) cite only one reference each to such behaviour, but give no details. While Doran (1976)

found eggshells in several pellets, the shells were not identified and no comment was made about their possible origins. Bannerman (1956) dismisses the subject by saying that while shells have been found in pellets, they could have been just from hatched eggs in the birds own nest. In view of the lack of substantive data, the following observations seem noteworthy.

On the evening of 27 May 1993, just after 2000 h EDST, I casually watched an adult male harrier from my home near Sunderland, in southern Ontario. It soared past from east to west within about 6 m of the ground. As it passed to the southwest corner of the house I suddenly realized that it was passing almost directly over a Killdeer (*Charadrius vociferus*) nest that I knew was there, in a disturbed area with little vegetative cover. The Killdeer pair was not easily disturbed, and had placed their nest within 45 m of the house and within 6 m of where I regularly drove or walked, apparently without flushing them or even eliciting any alarm calling. I had found the nest, with a completed clutch, four days previously when deviating from my usual path.

Unfortunately, I did not see a Killdeer leave the nest, as it was placed just over the crest of a small gradually sloping hill. The bird could easily have flown downslope completely out of sight. The low approach of the harrier may also have been concealed from the Killdeer, partly by the hill, but also by clumps of alfalfa and other plants growing to the east of the nest. But, a sudden change in the course of flight by the harrier as it passed near the nest suggests that the Killdeer did not flush until the harrier was within a few metres of the nest. The harrier then circled three times as if searching for something specific, and dropped to the ground right at the nest. At that point I ran for a pair of binoculars at a closer window with a better view.

The harrier picked up one egg at a time, stepped from the nest a step or two, placed the egg down, shuffled forward as if to hold it with one or both feet (that I could not see just over the crest of the hill), and immediately began to eat. The shell was easily broken as no specific effort was noted to accomplish that. The bird repeatedly lowered its head for some of the egg contents and raised its head to mouth and/or swallow what it had obtained. The harrier took 15 minutes to eat the four eggs before leaving. I then went outside to examine the nest area.

The harrier had apparently pecked into the side of each egg and enlarged the hole as it methodically worked at emptying the contents. The ends of the eggs were left intact, and the two ends of one egg were still joined together by a small amount of shell on the side.

The eggs had been incubated for at least four days, but embryos were probably still very small. Although I was not always able to see clearly as the bird ate because of the way it turned, I did not detect it removing any solid item from the eggs. The size of the air cell in the remaining shells suggested that the eggs were certainly not even half incubated. Despite the largely soft contents, the harrier had been able to empty the eggs nearly completely, and there was very little of the contents to be seen spilled on

the gravel about the nest. The shells were obviously not the desired food item, as much of it was discarded. Nonetheless, there was no obvious attempt to separate shells, and much was no doubt consumed.

While the food habits of Northern Harriers have received considerable attention, egg eating is likely to have gone largely unnoticed. Studies of food habits have relied heavily on an analysis of regurgitated pellets. But the eggshells of birds, especially those of small birds, are not likely to remain sufficiently intact to be easily identified. Even an examination of stomach contents, also widely used formerly, is unlikely to reveal eggshells that would be highly fragmented by the process of eating, or crushing by the stomach. It also seems unlikely that eggs would be brought to a nest to feed young, where the eggs might be seen by an observer. The birds are ill equipped to carry more than one intact egg at a time, except by swallowing smaller eggs whole, probably crushing them. If a single larger egg was carried to the nest, it would be difficult to feed the contents to young (unless it contained a large embryo), and the rest of the clutch would have to be temporarily abandoned to do so. Eggs even the size of a teal's probably could not be lifted intact. It seems more likely that eggs would be consumed where found. Even if an observer were watching in the field, such activity would be difficult to detect in tall grasses where the bird normally would be feeding.

But, despite the lack of observations of egg eating, the behaviour of the bird I watched suggested that this is done with some regularity. The harrier immediately began to search apparently after flushing a bird, it handled the eggs with no hesitation, and ate the soft contents with scarcely any loss. It appeared to be experienced in such activity. Egg eating by Northern Harriers may be much more common than realized.

Acknowledgements

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Recognizable Forms

Subspecies of the Dark-eyed Junco

by
Ron Pittaway

Introduction

The Dark-eyed Junco (*Junco hyemalis*) is comprised of many forms that are recognizable in the field. Just take a look at the six forms of the Dark-eyed Junco illustrated on page 403 of the National Geographic Field Guide (Scott 1987). Before they were lumped by the American Ornithologists' Union (AOU 1973), Ontario birders eagerly checked the migrant and winter flocks of Slate-colored Juncos (*J. hyemalis*) for Oregon Junco (*J. oreganus*). Reports of Oregons almost ceased after 1973! Yet juncos are a good example of why birders should look at recognizable forms. By looking just at species, we are limiting our opportunities of seeing interesting birds and learning more about them. In the following, I describe the identification features and occurrence of the recognizable forms of the Dark-eyed Junco in Ontario.

Taxonomy

The AOU Check-list (1957) listed the following five species of juncos that were later lumped as the Dark-eyed Junco: (1) Slate-colored Junco (*J. hyemalis*); (2) Oregon Junco (*J. oreganus*), including the Pink-sided Junco (*J. o. mearnsi*); (3) White-winged Junco (*J. aikeni*); (4) Gray-headed Junco (*J. caniceps*), including the Red-backed Junco (*J. c. dorsalis*); and (5) Guadalupe Junco (*J. insularis*). The two well-marked subspecies included in the above were also formerly recognized by some authorities as distinct species: the Pink-sided Junco (*J. mearnsi*) and the Red-backed Junco (*J. dorsalis*) (Sibley and Monroe 1990).

The AOU (1973) lumped all of the above species (except the Gray-headed Junco) as the Dark-eyed Junco because they interbreed where their ranges come into contact. The Gray-headed was later merged with the others (AOU 1983). However, interbreeding is "minor in most cases" according to George Barrowclough (pers. comm.) of the American Museum of Natural History. Michel Gosselin (pers. comm.) of the Canadian Museum of Nature stated that "the forms are quite distinct in most areas and this is borne out by specimens".

Currently, most ornithologists follow the Biological Species Concept (BSC) which means that populations that freely interbreed, or if separated, could potentially interbreed with one another, are the same species. Recently, a new species concept called the Phylogenetic Species Concept (PSC) has been gaining wider acceptance. The PSC recognizes as separate species those populations and subspecies which have distinctive traits and are evolving along separate evolutionary lines. The identifiable forms treated

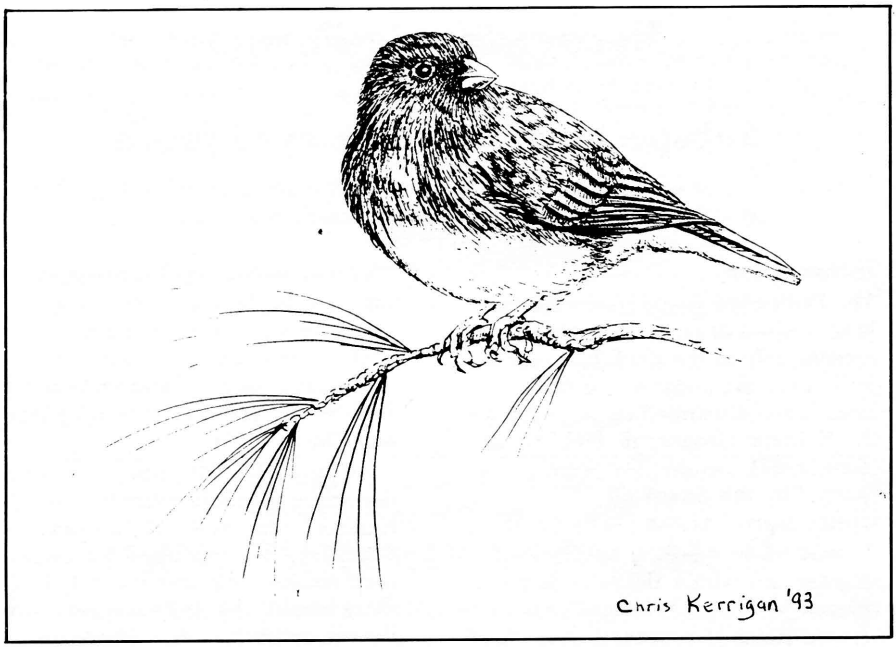

Figure 1: Slate-colored Junco. Drawing by *Christine Kerrigan.*

in this article are considered to be phylogenetic species (George Barrowclough, pers. comm.).

For a list of the junco subspecies (races) in Canada see Godfrey (1986), and for Ontario see James (1991).

Plumages, Ageing and Molts

The following describes the plumages and ages of the Slate-colored Junco (*hyemalis* group). The molts are similar in all forms.

Adult juncos (definitive basic) undergo a complete molt on the breeding grounds before fall migration takes place. Most adults (particularly females) in fresh fall feathering are tinged with buff or brown. The brownish feather tips largely wear off by summer, resulting in a darker plumage.

The streaked, sparrow-like juvenile (juvenal) plumage is seen only on the breeding grounds - see the illustration on page 403 of the National Geographic Field Guide (Scott 1987). Juveniles undergo a partial molt to first year (first basic) plumage before autumn migration. First year birds are duller and more uniformly brown than adults. Juncos retain their first year plumage for about one year, after which they molt completely into adult plumage.

Slate-colored Junco: (*J. h. hyemalis* group)

This is the common form in the province. In winter, it frequents feeding stations in southern Ontario.

The Slate-colored Junco is made up of three very similar subspecies:

nominate *hyemalis* of the boreal forest; *cismontanus* of western Canada; and *carolinensis* of the Appalachian Mountains (AOU 1957). In Ontario, James (1991) lists *hyemalis* as breeding in the province and *cismontanus* as an "occasional, rare straggler, autumn to spring". *Cismontanus* is "similar to *hyemalis* but hood more blackish, often noticeably darker than back; back more brownish; females with sides more mixed with pinkish brown" (Godfrey 1966, 1986). The subspecies *cismontanus* intergrades with the subspecies *montanus* of the Oregon form in Alberta and British Columbia, resulting in puzzling intergrades.

Some female Slate-colored Juncos are difficult to separate from some Oregon Juncos. In the Slate-colored Junco, "usually there is some indication of slate colour near the junction of the base of the hood with the sides" (Godfrey 1966).

Oregon Junco:
(*J. h. oreganus* group)

In Canada, three very similar western races, *oreganus, montanus,* and *shufeldti,* form part of a subspecies group formerly known as the Oregon Junco (Godfrey 1966). (The Pink-sided Junco, *mearnsi,* is often grouped with the above, but is distinctive enough to merit separate treatment.) James (1991) lists both *montanus* and *shufeldti* as "occasional, rare straggler, autumn to spring" for Ontario. The only Ontario specimen of Oregon Junco in the Canadian Museum of Nature was collected at Kingston in March 1958. It has been identified as *montanus* by Dr. W. Earl Godfrey (Michel Gosselin, pers. comm.). Most specimens from the East have also proven to be of the widespread *montanus;* for example, in New York State, Bull (1974) lists four specimen records of *montanus* and Tufts (1986) lists *montanus* from Nova Scotia.

Adult male Oregon Juncos (with their convex black hoods, chestnut backs and scapulars, and rufous sides) are easily recognizable. See Plate 72 in Godfrey (1986). Adult females are duller with grayer hoods. Some female Oregons are occasionally misidentified as Pink-sided Juncos, *mearnsi,* but Oregons generally have darker, more contrasting hoods and lack the contrasting blackish lores of the Pink-sided. See the illustrations on page 403 of the National Geographic Society Field Guide (Scott 1987).

First year (first basic) female Slate-colored Juncos of the subspecies *cismontanus* often have pinkish sides and brownish backs and are sometimes difficult to distinguish from Oregon Juncos. With Oregons, "note that the dark hood on the breast tends to turn up on the sides of the breast and does not extend onto the sides; on the Slate-colored Junco this turns downwards on the sides of the breast onto the sides" (Godfrey 1966). Confusing individuals are best just called Dark-eyed Juncos.

Pink-sided Junco:
(*J. h. mearnsi*)

The Pink-sided Junco is usually grouped with the Oregon Junco group of subspecies (AOU 1957, Godfrey 1966). It is considered to be a phylogenetic species and therefore is treated separately here.

James (1991) states that "*mearnsi*

has been reported as sighted in Ontario, but no specimens confirm this". Pink-sided Juncos have also been reported in Quebec (Michel Gosselin, pers. comm.) and Nova Scotia (Tufts 1986). However, most reports of Pink-sided Juncos in the East probably refer to pale female Oregon Juncos. Pink-sided Juncos(sexes similar) are best distinguished from female Oregons by their paler blue-gray (in the field) hoods and contrasting blackish lores, grayish brown backs and more pinkish sides (brighter than back). Refer to the illustrations of Pink-sided and female Oregon juncos on page 403 in the National Geographic Field Guide (Scott 1987).

White-winged Junco: (*J. h. aikeni*)

The White-winged is the largest and palest of the juncos (Miller 1941). It breeds in the Black Hills of South Dakota and adjacent mountainous areas.

The White-winged Junco has been reported in Ontario on a number of occasions, and it was added to the Ontario list (Baillie 1964) based on a specimen collected in Metropolitan Toronto (Scarborough) on 1 January 1964 (ROM 93625). However, this specimen was examined by Earl Godfrey and determined to be a Slate-colored Junco with "abnormal white wing bars"; it also did "not match a White-winged Junco in the amount of white in the tail or in size". It was subsequently removed from the Ontario list (Baillie 1965). The above record was also reported in Bent (1968).

Slate-colored Juncos "occasionally show a slight presence of white wing bars" (Earl Godfrey, pers. comm.) and some White-winged Juncos lack white wing bars (Miller 1941). Typical White-winged Juncos are bigger and a paler gray (ashy) colour than Slate-colored Juncos, with more white in the outer tail feathers (usually first three and part of fourth on each side). The Slate-colored Junco usually has two white outer tail feathers and the third is partially white. (Miller 1941, Bent 1968, Oberholser 1974).

Gray-headed Junco: (*J. h. caniceps* group)

Godfrey (1986) lists two Canadian records of this distinctive junco of the western United States. Both records are of the more migratory northern subspecies, *caniceps*. This beautiful junco is illustrated on Plate 72 in Godfrey (1986).

A Gray-headed Junco (sexes similar) was found and photographed in colour at Point Pelee on 9 May 1989 by John and Ginny Kreest (Alan Wormington, pers. comm.). It was reported in the sightings book at the park but apparently no one went to see it. Ten years earlier, when it was considered a full species, it would have caused a stampede! I examined the photograph of the Point Pelee bird (courtesy of Alan Wormington) and its pale upper mandible is clearly evident, indicating *J. h. caniceps* rather than the more southerly and less migratory Red-backed Junco (*J. h. dorsalis*) which has a dark upper mandible. See the illustrations of these two subspecies on page 403 in Scott (1987) and on page 333 in Peterson (1990).

Summary

The Dark-eyed Junco is made up of several rather distinct subspecies and groups of similar subspecies that were formerly considered to be separate species. They are treated here as identifiable forms of the Dark-eyed Junco. Intergrades occur, but because of sharp clines between populations, most forms are quite distinct and recognizable in the field. For additional information, the reader is referred to Bent (1968) and Farrand (1983).

Acknowledgements

I wish to thank Bob Andrle, George Barrowclough, Dan Brunton, Bill Crins, Bruce DiLabio, Earl Godfrey, Michel Gosselin, Jean Iron, Ross James, Chris Lemieux, Ron Tozer, Mike Turner and Alan Wormington for assistance and comments. Christine Kerrigan kindly did the illustrations of the Oregon Junco (cover) and Slate-colored Junco.

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Notes

Northern Fulmar Sighting at Moosonee, Ontario

by
Bryan Merritt

On 30 November 1992, a Northern Fulmar (*Fulmarus glacialis*) was sighted in Moosonee. Mr. Redfern Whiskeychan, a resident of Moosonee, reported an injured "seagull" to Ministry of Natural Resources officials. Ministry Compliance Specialist Bryan Merritt attended the location and captured the then flightless fulmar. The bird was taken to the local Ministry office where positive identification was made by Doug McRae and District Biologist John Thompson.

Conditions at the time of capture were quite severe. Temperatures were well below freezing and there was approximately 2 feet (0.7 m) of snow on the ground. The day prior to the capture, the last of the Moose River adjacent to Moosonee had frozen. The capture location was less than 200 metres from the River but would have been one half mile from the last open water. The townsite of Moosonee is located approximately 12 km up the Moose River from James Bay (at 51° 17'N & 80° 39'W).

Figure 1: Northern Fulmar at Moosonee on 30 November 1992. Photo by *Doug McRae.*

The fulmar was euthenized at the district office due to the extremely weak and emaciated condition of the bird. The following data were recorded from the bird prior to preparation of the specimen: weight 491 gms, wing length 285 mm, culmen length 37 mm, tarsus length 58 mm, and tail length 113 mm. Other characteristics observed during the necropsy included: absence of body fat; one leg had a small injury; and there was a small hole in the web of one of the feet.

These measurements were taken according to Pettingill (1985). The study skin was prepared by Doug McRae and the fulmar was subsequently delivered to the Royal Ontario Museum.

This fulmar is the 17th reported in Ontario, although some of the other reported sightings are for multiple birds. All reported sightings in the James Bay area were recorded between 19 October and 15 January. These include two and three reports from East Point and Netitishi Point, respectively, in southern James Bay (McRae 1994). Interestingly, on 8 December 1974, a fulmar was captured inland from Moosonee in a spruce forest (Prevett 1975). The conditions appeared to be quite similar to those under which this fulmar was captured.

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Leg and Bill Colour of Purple Sandpipers

by
Ron Pittaway

On both 6 November and 14 November 1993, Jean Iron and I observed a single Purple Sandpiper (*Calidris maritima*) on the rock jetty at Whitby harbour, Durham Region. They were aged as being in first winter (first basic) plumage based on the contrasting pale fringes to their wing coverts (Cramp and Simmons 1983). Both birds (or perhaps the same bird) had fairly bright orange coloured legs as well as the base of the bill. Ron and Doug Tozer (pers. comm.) observed two Purple Sandpipers at Whitby harbour on 14 November 1993. They also described

the legs and base of the bill as being "quite bright orange" in colour. These observations are contrary to the colours of the soft parts as described in most of the literature (Bent 1927, Chandler 1989, Cramp and Simmons 1983, Godfrey 1986, Oberholser 1974, Peterson 1980, and Prater *et al.* 1977). A typical description is found in Hayman *et al.* (1986), the standard reference on shorebirds, who describe and illustrate the legs and base of the bill as "dull yellow often tinged brownish or greenish". Illustration 202b on plate 83 shows a first non-breeding (first winter) bird. The greenish legs remind me of a Least Sandpiper (*Calidris minutilla*), certainly not a Purple Sandpiper of this age!

Interestingly, Chris Lemieux (pers. comm.) observed 6-8 Purple Sandpipers on 11 November 1993 at Presqu'ile Provincial Park. He observed the birds using a 20x power scope and at a distance on an island. Occasionally he noted a flash of orange from the legs as the birds moved about on a log. As well, Lemieux (pers. comm.) had many close views of + 18 Purple Sandpipers over a ten day period on the Shetland Islands off the north coast of Scotland in late August and early September 1992. He found their leg colour reminiscent of a Ruddy Turnstone (*Arenaria interpres*), being more orange and vibrant in colour than expected.

Previously, Ron Tozer and I have often observed Purple Sandpipers in November at great distances on the ledge rocks above Niagara Falls. They resembled European Starlings (*Sturnus vulgaris*) except for the occasional flash of their orange coloured legs! On 21 November 1993, Jean Iron and I watched three Purple Sandpipers at Niagara Falls. Their legs were usually covered by water, but showed yellowish-orange at times. The colour of the legs was more orange than yellow and quite bright. Kevin McLaughlin (pers. comm.) has seen Purple Sandpipers in southern Ontario a number of times. Most have been in first winter plumage and had "yellow-orange" legs.

The two most accurate examples of leg colour in the Purple Sandpiper are on page 220 in Jonsson (1993), — note the bright and decidedly orange coloured legs on the first winter bird; and the fairly bright yellowish-orange legs on the (first) winter bird on page 393 in Farrand (1983). No guide adequately describes the brightness of the legs, particularly when viewed against a dark background, or states that the orange leg colour is often visible at considerable distances. Is it possible that some of the early and inaccurate descriptions, for example, Bent (1927), have been repeated by subsequent authors? Another possibility is that considerable age, seasonal, and/or individual variations exist in the colour of the soft parts.

In summary, it appears that the rather bright yellowish-orange colour of the legs and base of the bill of Purple Sandpipers is poorly described in much of the literature. I encourage birders to carefully note the age, and leg and bill colours of Purple Sandpipers. I would be interested to hear of your observations.

Acknowledgements

I wish to thank Michel Gosselin, Jean Iron, Chris Lemieux, Kevin McLaughlin, Doug Tozer and Ron Tozer for information on Purple

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Short-billed Dowitcher Nest Found in Ontario

by
Gregory J. Soulliere

Short-billed Dowitchers (*Limnodromus griseus*) nest primarily in central Canada, northern Quebec, and southern Alaska (Bull and Farrand 1977). In Ontario, their breeding status is poorly documented, but they are believed to be rare, probably restricted to the Hudson Bay Lowland (Harris 1987). In 1963, downy young and fledglings were found near the Winisk River on Hudson Bay (Tuck 1968). However, a nest was not recorded and their breeding status has remained "hypothetical" (Peck and James 1983).

On 10 June 1992, I found a Short-billed Dowitcher adult incubating a nest in northern Ontario, 20 km west of the Winisk River and 15 km south of the Hudson Bay coast (55° 27'N & 85° 50'W). The nest was near the edge of an open fen, which was 200 m wide and between 2 parallel black spruce (*Picea mariana*) ridges. It was on top of a 0.3 m tall sedge hummock surrounded by 0.1 m deep water

intermixed with other hummocks. It contained four buffy greenish-brown eggs with brown flecks. The nest bowl was lined with sedge. I photographed the nest and the adult, which calmly remained less than 20 m from the nest after being flushed. It appeared to be the *L. g. hendersoni* subspecies (Jaramillo *et al.* 1991).

This was the only dowitcher nest noted during a rather unique and intensive birding venture. From 5-20 June 1992, I assisted with a "ground survey" of Canada geese nesting within 50 km east and west of the former Cree village of Winisk, Ontario (destroyed by ice/flood in 1989). Survey participants were transported by helicopter from our base camp (55° 15'N & 85° 00'W) to 30 "lowland forest" and 29 "coastal tundra" survey transects (0.5 x 2.0 km) that were remote and otherwise inaccessible. Coastal transects were less than 5 km from areas influenced by Hudson Bay tides, and interior transects were less than 40 km inland from the coast.

A 16-person survey crew systematically walked and thoroughly searched a total of 59 square km of Hudson Bay Lowland comprising the 59 transects. In addition to geese, nearly all members concomitantly noted unique bird sightings; avid birders assisted others with unfamiliar species. Perhaps 15% of the study area was sparsely treed fen, similar to the dowitcher nest location. An additional 50% of the area searched was open or semi-open tundra/sedge-covered wetland near "the treeline". A number of interesting sightings were noted by the group, including additional dowitchers. Although we found only one Short-billed Dowitcher nest, the area of potential nesting habitat appeared vast. Short-billed Dowitchers may actually be regular breeding species in this transition zone (forest/tundra/sedge meadow), but because of the extreme remoteness of the Hudson Bay Lowland, nests have gone unreported.

Acknowledgements

Doug McRae assisted in bird identification and John Schneider and Nancy Wilson reviewed the manuscript.

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Hour of laying of the House Finch and the Blue-gray Gnatcatcher

by
David M. Scott

Introduction

It is noteworthy that excellent summaries of the nesting biology of birds (e.g., Peck and James 1987) usually lack information on the hour of laying of common birds. This reflects the scarcity of records of laying times, a scarcity that results from the difficulty of recording laying times and also from the reluctance of observers to disturb a laying bird. As there is increasing interest in the time of laying in relation to the time of copulation (Birkhead and Møller 1992), it is worthwhile to record some laying times of some House Finches (*Carpodacus mexicanus*) and a Blue-gray Gnatcatcher (*Polioptila caerulea*), two species for which no precise laying times seem to have been reported. I recorded laying times for these species at London, Ontario.

Methods

To estimate laying times, I used Skutch's method (1952). I arose at dawn, well before sunrise, to visit a nest before laying had occurred for a given day and then observed or estimated the time at which the female arrived at the nest to lay. I then watched her until she had left after laying or I returned periodically until she was no longer on the nest. If the female had not left within about 30 minutes of her arrival, I forced her to leave the nest.

I observed three nests of House Finches. One found in 1991, was about 3 m above the ground at the tip of an overhanging branch of a 15 m-tall Blue Spruce (*Picea pungens*). Standing on a small portable ladder and using a mirror, I could inspect the contents of the nest. The other two nests, built in 1992 by apparently the same female, were on a lamp bracket about 2 m from the floor of the porch of my home, and could be readily inspected using a mirror. In each location, I could sit in my car and watch the comings and goings of the female.

I observed only one nest of the Blue-gray Gnatcatcher, a nest that was supported on a branch close to the trunk of a hawthorn (*Crataegus* sp.), about 2 m above the ground. Again, using a mirror and a kitchen step-ladder, I could inspect the nest's contents.

I relate time of laying to the time of sunrise (SR) which I extracted from Tables of Sunrise, Sunset, and Twilight in the supplement to the American Ephemeris, 1946, published by the United States Naval Observatory, Washington, D.C. All times recorded by me are Eastern Standard Time.

Results

House Finch

Nest 1

20 Apr - 0 eggs at 1200h EST;
21 Apr - Egg 1 present at 1000h;
22 Apr - Egg 2 laid at 0555h ± 15 min (SR + 22 ± 15 min);
23 Apr - Egg 3 laid at 0547h ± 15 min (SR + 16 ± 15 min);
24 Apr - Egg 4 laid at 0615h ± 15 min (SR + 45 ± 15 min);
25 Apr - Egg 5 (last of clutch) laid after 0602h (SR at 0528h).

Nest 2 (probably same female as for nest 3)

09 Apr - Egg 1 laid before 0630h (SR at 0554h);
10 Apr - Egg 2 laid at 0610h ± 18 min (SR + 18 ± 18 min);
11 Apr - Egg 3 laid at 0620h ± 15 min (SR + 29 ± 15 min);
12 Apr - Egg 4 laid at 0617h ± 10 min (SR + 28 ± 15 min);
13 Apr - Laying of Egg 5 (last egg of clutch) unobserved.

Nest 3

08 Jul - Egg 1 laid at 0544h ± 17 min (SR + 50 ± 17 min);
09 Jul - Egg 2 laid at 0527h ± 17 min (SR + 31 ± 17 min);
10 Jul - Egg 3 laid at 0530h ± 15 min (SR + 35 ± 15 min);
11 Jul - Laying of Egg 4 (last egg of clutch) unobserved.

The nine periods during which eggs were laid ranged in length from 20 min. to 36 min. As females probably spent a few minutes before and after laying (e.g., Prairie Warbler *Dendroica discolor* in Nolan 1978), the mid-points of the periods observed by me must have been close to the actual laying times. Thus, the eggs were laid about midway in the hour following sunrise.

Blue-gray Gnatcatcher

23 May - 1 egg (presumably the first egg of the clutch) present at 1000h EST;
24 May - Egg 2 laid at 0533h ± 13 min (SR + 39 ± 13 min);
25 May - Egg 3 laid at 0515h ± 15 min (SR + 22 ± 15 min);
26 May - Empty at 0435h.

The mid-points of the observed laying periods, as for the House Finch observations, must have been close to the actual laying hour. Thus, the eggs were also laid close to 0.5 h after sunrise.

Discussion

The laying times of House Finches observed by me agree with observations reported previously. Bergtold (1913) in Colorado reported layings between 1900h and 0700h and Evenden (1957) reported that four eggs were laid before 0730h, the last being laid between 0545h - 0740h at Sacramento in late April, when the sun rose at about 0515h. Roe (pers. comm.) observed at Mendenhall, PA, that Egg 2 was laid on 2 Apr 1992 between 0645h and 1030h and that Egg 3 was laid before 0630h on 3 Apr; the combined records suggest that laying occurred well after sunrise which occurred about 0545 h.

House Finches seem to lay closer to sunrise than does a congeneric species, the Common Rosefinch (*Carpodacus erythrinus*), judged by the following records. Steinfatt (1937), in what was East Prussia, determined that the fourth egg of a five-egg clutch was laid between 0445h and 0545h on 8 June when sunrise was about 0300h. Stjernberg (1979) in western Finland found that eggs were laid in June between 0430h and 0600h (there, sunrise on 21 June was about 0239h).

My observations on laying times of the Blue-gray Gnatcatcher are apparently the first precise record of the hour of laying for any member of the genus *Polioptila*.

Laying soon after sunrise by the two species listed herein is characteristic of many other small birds, as pointed out by Skutch (1952) and Schifferli (1979).

Acknowledgements

I thank A.M. Roe for his record of laying by a House Finch.

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Breeding Habitats of Brewer's Blackbird in Central Ontario

by
Bill Crins and Steve O'Donnell

Brewer's Blackbird (*Euphagus cyanocephalus*) is a common and widespread, loosely colonial species of the prairies and agricultural areas of central and western Canada and the U.S.A. In the bulk of its breeding range, west of Ontario, it generally selects nesting sites in open scrubby woodland, sagebrush, or wet meadows and bushy swamps (Horn 1968, Walkinshaw and Zimmerman 1961). There is considerable variation

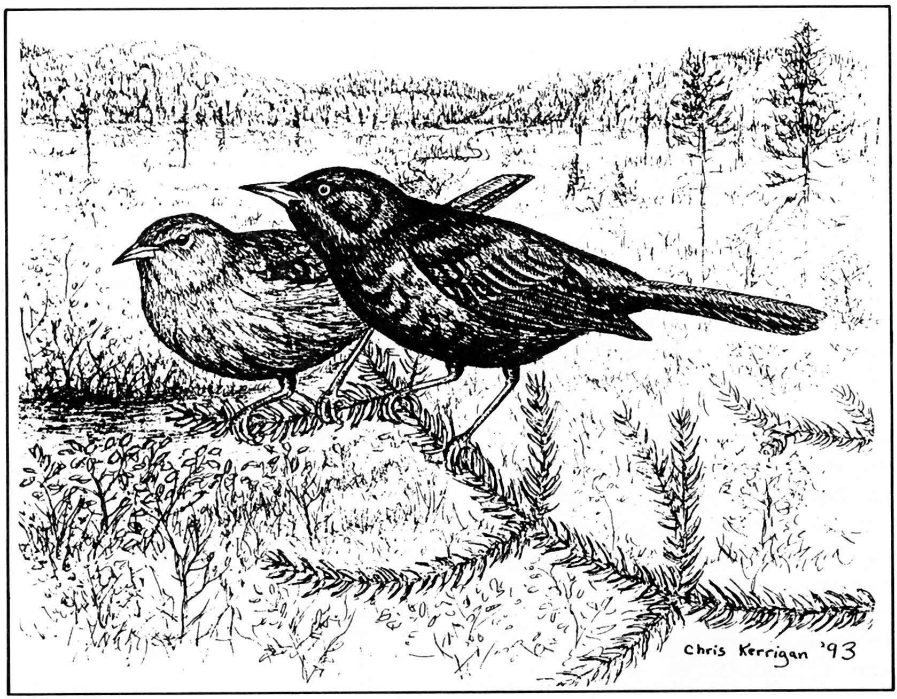

Figure 1: Pair of Brewer's Blackbirds in peatland habitat. Drawing by *Christine Kerrigan.*

in nest placement. In some areas, nests are rarely located more than 3 m above ground, and nests situated directly on the ground, on dry sites in meadows, on banks above small creeks, or in dried, recently burned marshes, are frequent. However, there are also reports of nests in conifer snags and stubs up to 40 m high (Furrer 1975, Walkinshaw and Zimmerman 1961). Furrer (1975) has shown that, at least in eastern Washington, no particular nesting site type provides an overall advantage, with regard to fledging success.

Since about 1914, the Brewer's Blackbird has been undergoing a range expansion eastward (Walkinshaw and Zimmerman 1961). By 1950, it had reached Indiana and Michigan. The first nesting record in Ontario occurred in the Thunder Bay area in 1945 (Allin and Dear 1947), and it had begun to nest in the Sault Ste. Marie area by 1953 (Baillie 1953, Wood 1955). These early Ontario nesting sites were located in cleared areas with scattered dead trees and along roadsides lined with planted White Spruce (*Picea glauca*) (Allin and Dear 1947, Speirs 1954). Following the successful establishment of the species in the Sault Ste. Marie area, there has been a steady eastward expansion, and small colonies can now be found in all areas with cleared land between Sault Ste. Marie and Sudbury (Devitt

1964, pers. obs.). It has also nested at other scattered locations in central and southwestern Ontario (Devitt 1969, Richards and Peck 1968).

Walkinshaw and Zimmerman (1961) noted that Brewer's Blackbird will nest in peatlands, at least in the eastern part of its range, although this habitat preference would generally be considered more typical of Rusty Blackbird (*Euphagus carolinus*) (Flood 1987). Gordon (1987) made no mention of this habitat type for Brewer's Blackbird in Ontario.

In recent years, Brewer's Blackbird has established small colonies in the vicinity of Lake Nipissing, and southward to Sundridge and Magnetawan. Several of these colonies are situated in peatlands (Magnetawan, Powassan, South River), although others are located in disturbed habitats such as upland cut-overs with windrows (Trout Creek), hay fields (Sundridge), and rows of conifers (Verner). The South River site was in a peatland that had been logged a few years ago, and retains some typical peatland species, such as Labrador-tea (*Ledum groenlandicum*), Dense Cotton-grass (*Eriophorum spissum*), and Bog Laurel (*Kalmia polifolia*).

In June 1992, one of the authors (SOD), as well as Jann Atkinson (pers. comm.) and several other observers, independently noted Brewer's Blackbird adults in a peatland, and on an adjacent golf course, at Powassan. On 26 May 1993, sixteen birds were seen, all along Hwy. 11 and the above-mentioned golf course (SOD). On 8 June 1993, at least three pairs were present in the same peatland adjacent to the golf course. The adults (both sexes) were extremely agitated, and on several occasions, were observed carrying caterpillars and other larvae. Adults were also seen flying to and from the golf course and an adjacent drained beaver meadow. Although visits to nests were not actually observed, it was clear that nests containing young were located in the immediate vicinity. One flightless young was discovered (premature fledging) on a wet hummock of small Black Spruce (*Picea mariana*), Leatherleaf (*Chamaedaphne calyculata*), Bog Laurel, and *Sphagnum*. The nest was not found, but because of the flightless condition of the young bird, it was probably somewhere on that, or an adjacent hummock. The surrounding area within the peatland was characterized by scattered small Black Spruce and Tamarack (*Larix laricina*), with various ericaceous shrubs, Dense Cotton-grass, other sedges, and grasses. Although the site occupied by the blackbirds could be considered a bog, most of this peatland would be classified as a poor fen.

We often have preconceived notions about the habitat preferences of birds. However, the occurrence of Brewer's Blackbird in peatlands should serve to reinforce the idea that some species are opportunistic, nesting in various kinds of habitats, and are not as stereotyped in their nesting habitat preferences as we might expect.

It is noteworthy that in situations where Brewer's Blackbirds do nest in peatlands, there are usually open fields, roadsides, golf courses, and other open habitats in the immediate vicinity. Perhaps these peatlands provide a more constant breeding habitat than hayfields and pastures,

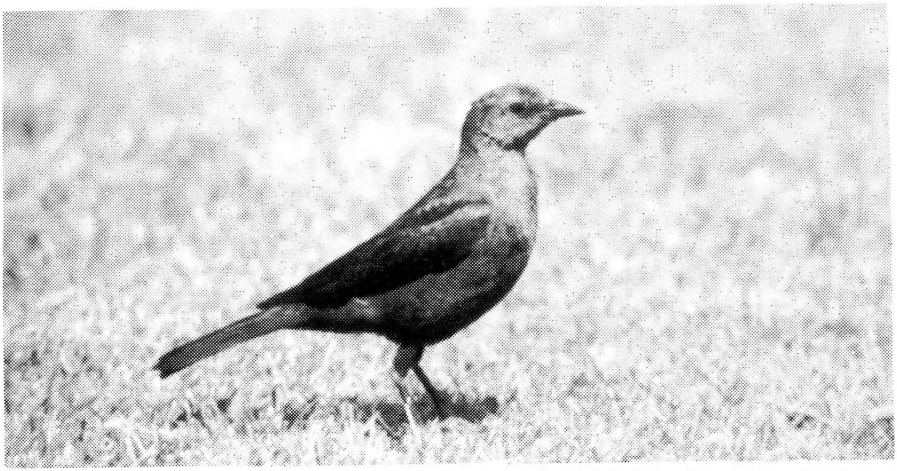

Figure 2: Female Brewer's Blackbird foraging on grass. Photo by *Don Gunn.*

where the probability of disturbance causing nesting failure is much higher (due to mowing or grazing and associated trampling). Thus, the peatlands may provide good nesting habitat, and the open grasslands and roadsides nearby may provide the necessary foraging habitat.

Acknowledgements

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Book Review

Birds of Presqu'ile Provincial Park. 1993. By *Steve M. LaForest.* The Friends of Presqu'ile Park and the Ontario Ministry of Natural Resources, Brighton. (softcover) XII + 436 pp. illustrated. $21.95 + $3.00 Postage and handling from The Friends of Presqu'ile Park, P.O. Box 1442, Brighton, Ontario K0K 1H0.

Presqu'ile Park is one of Ontario's premier birding areas. Like all major promontories along the Great Lakes, it is a migrant trap, bottling up landbird migrants both spring and fall on the hook-shaped peninsula. Offshore ducks congregate, while the long beaches provide shorebirds with some of their best foraging along the lower Great Lakes. In the breeding season the marshes, deciduous and evergreen woodlands and old fields attract a rich array of nesting birds, and in winter Snowy Owls sit on the ice ridges and winter finches chatter in the conifers. In all 312 species have been recorded here, and 126 have nested.

This book is the account of this rich birdlife. The first published list of the birds of the park was by Ron Scovell in 1960, and in 1982 Doug McRae's *Birds of Presqu'ile* appeared. That booklet was 74 pages long; the present book has 436 pages, an indication of both the amount of field work summarized here, and the completeness of the treatment.

For those accustomed to regional bird listings, the format of this present book will be familiar. The account for each species covered starts with a brief one-to-three line statement of overall status. Subsequent treatment then varies. For those birds that are regular in the park, the author traces their seasonal status from spring through winter, giving the first and last dates, high counts and any other information of interest, including egg dates when available. In the case of Ring-billed Gull, a three page account gives details of the history of the huge colony, with banding data and population counts.

Rare species are accorded similarly thorough coverage. For the rarest full details of the record are given, with mouth-watering verbatim quotes from the (often dazed) observer! More regular vagrants have all their occurrences listed, while the simply unusual have their outside dates and high counts given. In all cases any changes in status are discussed, and there are references to occurrences in adjacent areas (such as Brighton) where relevant. Seven species are listed separately, in a category of "Unacceptable Records, Extinct Species and Escapees".

February 28, 1991 was the cut off date for observations used in the text, but an addendum lists some more noteworthy sightings as late as March 1992.

There's more to the book than the systematic list of birds. After an evocative foreword by Barry Kent MacKay, there is a profile of the area, setting the regional context and outlining the history both of Presqu'ile itself and of birding there. Then there is a useful 14-page guide to the park and its environs, which gives someone unfamiliar with the area an excellent overview of where to go and when.

The book concludes with lists of scientific names of plants, of literature cited, and selected references relating to ornithological research done at Presqu'ile. At the end is a short list of park facilities, visitor information and a map of the park.

Book reviews are supposed to nit-pick, but there's little to complain about here. I found the book's layout rather cluttered, and the poor reproduction of the illustrations does little to enhance either them or the book itself. Misprints are agreeably few, and the information presented seems accurate. In sampling the index one or two entries were listed for the page facing the actual page of entry. The index, incidentally, lists both scientific and English names for the species, and is unusual in that Brown Thrasher, for example, can be found under both Brown and Thrasher - probably a good feature in a book that may be used by persons unfamiliar with bird names and indices.

There is also a long section on acknowledgements, with an alphabetical list of all the observers who have contributed observations over the years. It's tempting to skim this, but in a very real way this is the story of the book - years of observations by a multitude of observers, all adding up to yield a comprehensive picture of the birdlife of one small but significant area. Some contributions stand out - the 17 years of observations by the Thomsons for example - but it is the sheer volume that yields the picture.

A book of this sort is a fine example of what can be done with input from visiting birders, contributing their individual sightings over a long period. It's a real stimulus and encouragement to observers to participate in the record gathering, and to fill in the gaps; or to resurrect forgotten observations that might improve the picture. This reviewer rather guiltily noticed some species where he had apparently forgotten to turn in sightings! By the same token it also enables the significance of a sighting to be addressed quickly - I'm unlikely to overlook future records with this compendium readily available!

But while the effort is a cooperative one, someone has to put it all together, and compiling a book of this kind is far more than a mechanical exercise. The author is to be congratulated on producing a well organized and comprehensive account of Presqu'ile birds. It is a valuable addition to the growing literature on Ontario birdlife, and if you bird in the park at all, you need this book.

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Photo Quiz

by
Bob Curry

Answer to Photo Quiz in *Ontario Birds* 11 (2): **White-eyed Vireo.** At least that's what they told me this was! Seriously, I find myself more like the readers in this case as, in contrast to most such analyses, I was not told any details about this bird or the circumstances which led to its being photographed and printed here. So often it has been my impression that the analysts in the various journals have all the details at hand and describe features which should be there when, to my eye, they are just not visible. To add to the difficulty the bird is rather dishevelled having, presumably, just been plucked from a mist-net.

Clearly the bird is a small passerine; I estimate it to be about 13-14 cm long based on comparisons with the hand holding it. Most readers will have quickly concluded that this is a vireo based on the gestalt of size, shape and bill proportions. Indeed, the bill is rather stout at the base but not conical like a finch or sparrow and tapers abruptly to a point with a slight "overbite" or hook to the upper mandible unlike the slender stiletto shape of most warbler bills. It also has the "big-headed" look common to most vireos. Empidonax flycatcher is a possibility in this size range but the body seems too chunky and the head too big. When seen from below many Empids have a broad based bill but it tapers to a fine point. Moreover, in side view like this, Empid bills are much more finely proportioned. Finally, there is the broad white eye-ring which upon close scrutiny, extends through the supraloral area to meet the bill base the commonly named spectacle of several vireo species. This seems rather dull in this specimen but I believe it to be an artifact of back lighting.

Now the real problems, which could easily be resolved in a colour photo, begin! Three Ontario vireos possess the combination of two bold wingbars and prominent spectacles: Yellow-throated, Solitary and White-eyed. As most readers are aware, the dark iris is typical of White-eyed in their first calendar year and, in my experience, this feature seems to be retained by some, into their first spring so this is of little use to us.

An examination of the contour plumage is instructive. The whitish throat and breast which contrasts markedly with the dusky sides of breast and flanks would seem to rule out Yellow-throated which would appear fairly uniform (concolor). Both the other two species have the underpart pattern of the subject bird. One would expect there to be greater contrast between head and back in (at least our race of) the Solitary Vireo with the head appearing darker than the back. This does not appear to be the case here and, in fact, the nape appears lighter than the back but the effect of light and shadow on abnormally ruffled feathers may be a

factor.

Solitary Vireo is a longer-winged bird with the tips of the folded primaries extending almost half way down the tail. White-eyed has shorter wings and this is particularly evident in the photograph. Pyle (*Identification Guide to North American Passerines*) states that some immature White-eyed Vireos have tapered rectrices and our bird certainly has tapered or pointed tail feathers. So the evidence, subtle though it may be, points towards a hatch year immature White-eyed Vireo. During most falls there is a movement of immature White-eyed Vireos northward into the province especially in October and November.

(Editors' Note: This hatch year White-eyed Vireo was banded at Prince Edward Point in late August, 1980, and was photographed by Doug McRae. In comparison, the next quiz bird should be relatively easy!)

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