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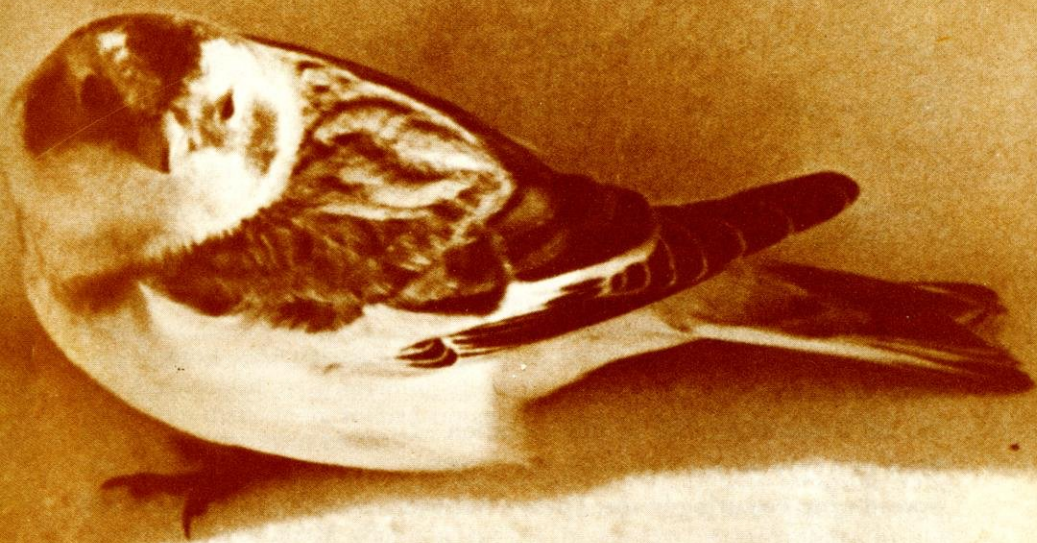
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Winter 1974

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# *The Passenger Pigeon*

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# The Willow and Alder Flycatchers In Wisconsin: A Preliminary Description of Summer Range

By SAM ROBBINS

The decision of the A.O.U. (Auk, 1973) to split the Traill's Flycatcher (*Empidonax traillii*) into two separate species raises some obvious questions for Wisconsin ornithologists. Heretofore the Traill's has been designated as a migrant and summer resident, either "common" (Schoenebeck, 1902; Kumlien & Hollister, 1903; Schorger, 1929-31; Buss & Mattison, 1955; Bernard, 1967; Knuth, 1970; Kemper, 1973) or "fairly common" (Barger, Lound & Robbins, 1960; Gromme, 1963). In none of these references was there any hint whether these birds now should be designated as Willow (*E. traillii*) or Alder (*E. alnorum*) Flycatchers, until 1973 when Kemper indicated both species probably occur in Eau Claire and Chippewa Counties.

Because of a series of vivid experiences with these birds in the 1930's, the author now has 35 years of records to draw upon a describing preliminary range maps for these newly described species. By sharing these personal experiences now, the writer hopes other observers may be encouraged to contribute their findings in the coming year. This will then make more refined range descriptions possible in a forthcoming book on Wisconsin birds.

Childhood experiences in Massachusetts were all with *alnorum*. One or two pairs could be encountered each summer in a swamp a mile from home. It was not a common species in eastern Massachusetts in the 1930's, but could be counted on in a few suitable areas. In those years there was little confidence that *empidonaces* could be safely separated by sight. But whenever a small eye-ringed flycatcher was found in a swamp habitat, there was intense listening for song. Whenever "fee-bee-o" was detected, "Alder Flycatcher" went down on the list.

In the summer of 1937 the writer visited Wisconsin for the first time, spending several weeks at a farm near Black Earth in western Dane County. Most of the birds were familiar to a transplanted Yankee, but one strongly-accented two-syllable call was new. There was momentary bewilderment when the singer was seen to have all the plumage characteristics of the "Alder", while uttering a song strikingly different from the Massachusetts version; but this was cleared up when Peterson's field guide was consulted describing a "fitz-bew" emitted by mid-western singers. From that time on, a singing "Alder" Flycatcher was recorded as "eastern" (fee-bee-o) or "western" (fitz-bew).

The practice was continued after 1957 when the fifth edition of the A.O.U. Checklist changed the specific name from Alder to Traill's. It would have been more accurate to have used "northern" for "eastern" and "southern" in place of "western"; but the writer did not then realize that "fee-bee-os" were widely distributed in northern Wisconsin and throughout Canada.



When the split into two separate species was announced in 1973, ranges were not described with sufficient precision to make clear which species belongs in Wisconsin. The Alder, a bird of the boreal forest swamps, was described as the bird of Alaska, Canada and eastern United States. The Willow, a bird of more open country, was mentioned as a resident of the Great Plains and prairie. A more definite map drawn by Stein (1963) shows breeding locations for "fit-bew" in North Dakota, southern Wisconsin, Illinois and Indiana, sites for "fee-bee-o" in Minnesota and Michigan, and spots where both species co-exist in central Wisconsin and southern Ontario.

Personal observations suggest that there is a large band of overlapping in Wisconsin that covers close to one-half the state. In arriving at this conclusion, the author has ruled out May and early June sightings. Any singing bird through the first week of June could well be a late spring migrant. Beyond August 10 virtually all singing has stopped. The dates shown on Figures 1 and 2 indicate the years in which personal records exist for singing birds between June 10 and August 10.

All records are based on song-identification. When McCabe (1951) attempted to combined various published song-descriptions, assigning some to "fee-bee-o" and some to "fitz-bew", a few descriptions were difficult to fit into any pattern. The writer has never experienced a bit of difficulty in assigning the songs he has heard either to *traillii* or *alnorum*. Nothing was ever detected that sounded intermediate. The "fitz-bew" is a two-syllable call, with both syllables strongly accented. The "fee-bee-o" is normally trisyllabic, with the accent concentrated on the second syllable. At times the third syllable is absent or very inconspicuous, and this may well have led to confusion for some listeners.

Not only has overlap been confirmed in all or parts of at least twenty counties, but also there is evidence of co-existence in the same marsh in several instances. In Adams, Marathon, Florence, Waukesha and Walworth Counties the writer has heard both species from a single listening spot. On most of these occasions inadequate attention was given to the prevailing vegetation. But on the two most recent occasions where both species were heard simultaneously, it could be detected that the "fee-bee-o" emanated from an area that was predominantly alder, and the "fitz-bew" issued from a spot where willows were numerous. There was in no instance any suspicion that both songs were being given by the same bird, nor was there any indication of encounter between individuals of both species.

### Description of Range

From Figure 1 it can be inferred that the Willow Flycatcher is the common breeding bird of southern Wisconsin. Personal records extend north to Amery (Polk), Bloomer (Chippewa), Lublin (Taylor), Dancy (Marathon), Aurora (Florence), Peshtigo (Marinette) and Brussels (Doors). Gaps in the southwest and southeast corners are doubtless due more to sparse field work than to an absence of birds. It is probable that this species is common north to La Crosse, Portage and Green Bay, and fairly common north to Amery, Chippewa Falls, Mosinee and Marinette.



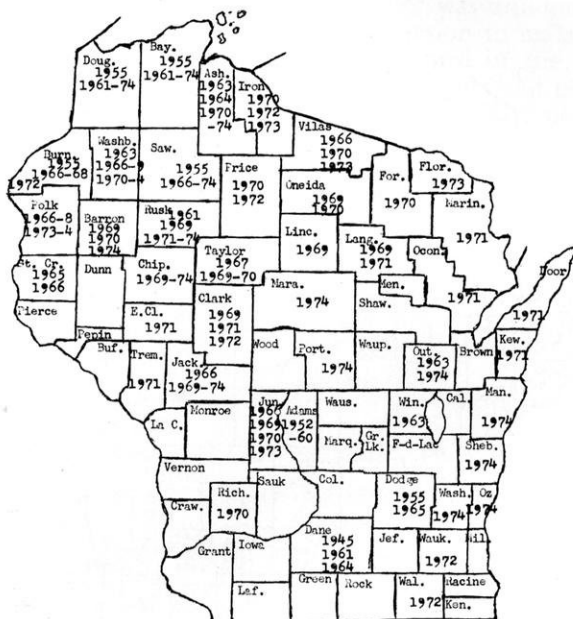


FIGURE 2. ALDER FLYCATCHER SUMMER RECORDS

### Overlapping Range

The heavy dots in Figure 3 indicate those counties in which there are recent summer records for both species. In a rough way this depicts that portion of the state where "fee-bee-o" and "fitz-bew" overlap. Superimposed is Curtis' "tension zone", an area containing the boundary of significant numbers of plant species peculiar to southern prairie or northern forest habitat. Beimborn (1970) suggested this tension zone is closely related to the edge of the breeding ranges of numerous birds that are not normally statewide in summer distribution. A case can be made for associating the summer range limits of the Alder and Willow Flycatchers with the tension zone. To do this one must make several assumptions.

- (1) More thorough field work should turn up **traillii** in Barron, Wood, Portage, Waupaca, Calumet, Sheboygan and Milwaukee Counties. Further study should reveal the presence of **alnorum** in Dunn, Wood, Waupaca, Shawano, Brown, Calumet, Fond du Lac and Milwaukee Counties.
- (2) Bratley's Bayfield County **traillii** should be considered a temporary wanderer rather than a representative of a resident population.
- (3) The **alnorum** residents in Richland, Dane, Walworth and Waukesha Counties are in the few northern-type bogs that remain in southern Wisconsin, and are probably declining. Stein (1963) presented evidence

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FIGURE 3. COUNTIES WITH SUMMER RECORDS OF BOTH WILLOW AND ALDER FLYCATCHERS

that over the past few decades *traillii* has been expanding its range, probably at the expense of *alnorum*.

(4) *Alnorum* may have achieved a break-through of the tension zone in the Fox River Valley region, carrying birds north to Brown, Kewaunee, Door, Oconto, Marinette and Florence Counties.

#### More Information Needed

It is hoped that other observers will help fill out and sharpen the summer range delineation for these two species. But great care must be exercised to insure positive identification. Three methods of identification are possible for observers with the proper training and equipment.

**Song.** With the aid of photograph and tape recordings, one can learn to differentiate the songs of the Willow and Alder. The Willow's "fitz-bew" consists of two syllables, both strongly accented, with the second syllable lower in pitch. The Alder's "fee-bee-o" contains three syllables: the first a short unaccented one, the second slightly higher in pitch and strongly accented, the third of lower pitch and often barely noticeable. The song may be heard any time from first arrival (May 10-15) to August 10, and is often heard early in the morning, even before daylight. Little if any song can be expected beyond mid-August.

**Nest.** Significant differences in nest construction have been described by Stein (1958, 1963). Alders build loose bulky nests resembling those of Song Sparrows, containing coarse grasses and often streamers

dangling below the nest. Willows build tighter more compact nests containing cottony material, similar to those of Yellow Warblers, usually without streamers. Alder nests are usually low in bushes, 1-2½ feet from the ground. Willow nests are occasionally as low as 1½ feet, but are usually 3-5 feet up and occasionally are built as much as 8 feet up. Nest-locaters are urged to document the site and structure of nests discovered.

**Bill and Wing Measurements.** Although there is some overlap, bill measurements average longer for *traillii*, while wing chord lengths are greater for *alnorum*. Banders and museum workers should consult Stein (1963) for detailed figures. Some banded birds will have measurements sufficiently extreme for sure identification.

As can be inferred from the recently chosen names of Willow and Alder, these species show differences in habitat preference, with *traillii* choosing areas dominated by willow and *alnorum* selecting alder trees and shrubs. Habitat preference may raise strong suspicions for identification purposes, but should not be considered definitive.

Non-banders should be cautioned not to attempt identification by sight alone. The A.O.U. (1973) recommends continued use of "Traill's Flycatcher" when it is not possible to distinguish between Willow and Alder. In fall observers generally would do well to list small eye-ringed flycatchers as "*empidonax* sp." rather than attempt to distinguish Alder, Willow, Least and Acadian.

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# FIELD NOTES

## THE WINTER SEASON (January 1—March 31, 1974)

By WILLIAM HILSENHOFF

Temperatures in January, February, and early March were above normal, and snowfall was minimal throughout the state, producing conditions conducive for overwintering of many species and the early migration of March migrants. In early January, Common and Hoary Redpolls and Pine Siskins invaded from the north. Crossbills and Northern Shrikes remained relatively common statewide, and there were many sightings of Snowy Owls and Goshawks. The balmy weather induced an exceptionally early migration of Canada Geese beginning February 17, and by the first week in March Killdeer, blackbirds, American Robins, Eastern Bluebirds, Song and Fox Sparrows, and many species of ducks were moving north in numbers. This early migration continued until mid-March, when winter-type weather returned to the state and almost completely halted the migration. Not until the last four days of March did spring return and induce a continuation of the migration.

Highlights of the season were a hypothetical sighting of a Thayer's Gull, the first for the state, a third state record for the Black-headed Grosbeak, two or more hypothetical sightings of European Siskins, and new arrival record for the Sandhill Crane and Bonaparte's Gull. The "Season Summary" follows, but does not include sightings of permanent residents except those outside the normal range.

### Season Summary

**Common Loon**—Arrived Waukesha Co. Mar. 27 (Bielefeldt).

**Horned Grebe**—Arrived Milwaukee Co. Mar. 15 (many observers).

**Pied-billed Grebe**—Wintered Milwaukee and Dane Cos. (many observers); arrived La Crosse, Barron, and Brown Cos. Mar. 6.

**Great Blue Heron**—Arrived La Crosse Co. (Leshner), Portage Co. (Baumgartner) Mar. 7.

**Great Egret**—Arrived La Crosse Co. Mar. 29 (Rosso).

**Mute Swan**—Wintered Columbia Co. (many observers).

**Whistling Swan**—Arrived La Crosse Co. Mar. 11 (Leshner), Dodge Co. Mar. 12 (Sanford).

**Canada Goose**—Wintered La Crosse Co. (Rosso), Portage Co. (Baumgartner); arrived Milwaukee, Dane, Ozaukee, Sheboygan, Juneau, Fond du Lac, and Grant Cos. Feb. 17-21.



- White-fronted Goose**—Arrived Rock Co. Mar. 6 (Craven), Columbia Co., Mar. 31 (Tessen).
- Snow Goose**—Wintered Brown Co. (Columban, Cleary); seen Kenosha Co. Feb. 12 (Tessen); arrived Grant Co. Mar. 3 (Smith), Waukesha Co. Mar. 6 (Bielefeldt) and Dodge Co. Mar. 6 (Sanford).
- Mallard**—Wintered north to Brown, Barron and St. Croix Cos.
- Black Duck**—Wintered north to Brown Co.
- Gadwall**—Wintered (190) Dane Co. (Tessen) and Milwaukee Co. (many observers).
- Pintail**—Wintered Milwaukee and Winnebago Cos.; arrived Grant Co. Mar. 2 (Smith), Barron Co. Mar. 6 (Faanes).
- Green-winged Teal**—Wintered Milwaukee Co. (many observers); arrived Fond du Lac Co. Mar. 8 (Knuth), Juneau Co. Mar. 14 (Updike and Ehlers).
- Blue-winged Teal**—Wintered Winnebago Co. (Tessen); arrived Kenosha Co. Mar. 9 (Harmer), Milwaukee Co. Mar. 15 (Basten).
- American Wigeon**—Wintered Milwaukee, La Crosse, and Dane Cos. (many observers); arrived Grant Co. Mar. 3 (Smith), Fond du Lac Co. Mar. 7 (Knuth).
- Northern Shoveler**—Wintered (50) Dane Co. (Tessen); arrived Grant Co. Mar. 3 (Smith).
- Wood Duck**—Wintered Milwaukee, Dane, La Crosse, and Winnebago Cos.
- Redhead**—Wintered Milwaukee and Winnebago Cos.; arrived Grant Co. Mar. 5 (Smith).
- Ring-necked Duck**—Arrived Grant Co. Mar. 3 (Smith), La Crosse Co. (Rosso) and Barron Co. (Goff) Mar. 6.
- Canvasback**—Wintered Milwaukee and Ozaukee Cos. (many observers); arrived La Crosse Co. Mar. 2 (Rosso).
- Greater Scaup Duck**—Wintered Lake Michigan; seen Dane Co. Jan. 26 (Tessen); undocumented inland reports Fond du Lac Mar. 7 (Knuth), La Crosse Co. Mar. 9 (Rosso).
- Lesser Scaup Duck**—Wintered Dane (Ashman) and Winnebago Cos. (Tessen); arrived Grant Co. Mar. 2 (Smith).
- Common Goldeneye**—Wintered statewide in open water.
- Barrow's Goldeneye**—Dane Co. bird photographed Feb. 24 (Shapas). This bird was previously seen in December (Foster).
- Bufflehead**—Wintered Kenosha, Milwaukee, Dane, and Ozaukee Cos.
- King Eider**—Remained in Winnebago Co. until Jan. 7 (Schultz).
- Oldsquaw**—Wintered Lake Michigan.
- Ruddy Duck**—Wintered Milwaukee Co. (many observers); arrived Fond du Lac Co. Mar. 7 (Knuth), Waukesha, Dane and Winnebago Cos. Mar. 9.
- Hooded Merganser**—Wintered Waukesha, Dane, and Ozaukee Cos.; seen Fond du Lac Co. Jan. 19 (Knuth).
- Common Merganser**—Wintered Milwaukee, Dane, and Ozaukee Cos.; arrived Grant Co. Feb. 15 (Smith).
- Red-breasted Merganser**—Wintered Milwaukee and Ozaukee Cos.; seen Kenosha Co. Feb. 3 (Hoffmann).
- Turkey Vulture**—Arrived Barron Co. Mar. 9 (Goff), Grant Co. Mar. 21 (Smith), and Sauk Co. Mar. 22 (Krings).
- Goshawk**—Numerous reports of wintering birds from throughout the state.
- Sharp-shinned Hawk**—Several reports of wintering birds north to Brown and Langlade Cos.
- Cooper's Hawk**—Wintered north to Brown and Portage Cos.
- Red-tailed Hawk**—Wintered north to Brown, Portage, and St. Croix Cos. Albino bird Dane Co. Mar. 24 (Hilsenhoff).
- Red-shouldered Hawk**—Wintered Grant Co. (Smith); arrived Mar. 3 Milwaukee Co. (Basten, Idzikowski, Tessen), Waukesha Co. (Bielefeldt), Dane Co. (Auler), and Mar. 6 in Barron Co. (Goff).
- Broadwinged Hawk**—Arrived Barron Co. Mar. 18 (Goff) (no documentation).
- Rough-legged Hawk**—Wintered north to Brown Co. Evidence of northward movement during first week of March.

**Golden Eagle**—Sighting in Burnett Co. Jan. 14 and 25 (Evrard), Juneau Co. Feb. 19 (Updike and Ehlers), Grant Co. Feb. 26 and 28 (Smith), and Jefferson Co. Mar. 23 (Tessen).

**Bald Eagle**—Wintered along water north to Brown, Portage, and Barron Cos.

**Marsh Hawk**—Wintered Ozaukee Co. (Bintz), Dodge Co. (Sanford); arrived Grant Co. Feb. 11 (Smith), Waushara Co. Mar. 4 (Greenman), Chippewa Co. Mar. 5 (Robbins), and Taylor Co. Mar. 6 (Fadness).

**Osprey**—Arrived Grant Co. Mar. 26 (Smith).

**Gyr Falcon**—Sighted Green Lake Co. Mar. 20 (Donald and Erickson). See "By The Wayside."

**Merlin**—Documented reports Columbia Co. Jan. 20 (Smith), Waukesha Co. Feb. 23 (Greenman).

**American Kestrel**—Wintered north to Barron Co. (Goff).

**Sharp-tailed Grouse**—Sighted south to Juneau Co. (Updike and Ehlers).

**Sandhill Crane**—Arrived Jefferson Co. Mar. 8 (Sharp), Columbia Co. Mar. 10 (Smith).

**Coot**—Wintered north to Winnebago Co.

**Killdeer**—Wintered Grant Co. (Smith); seen Waukesha Co. Jan. 19 (Tessen); arrived Portage Co. Feb. 28 (Baumgartner), Dane Co. Mar. 1 (P. Ashman), almost everywhere else Mar. 2-3.

**Woodcock**—Arrived Milwaukee Co. Mar. 3 (Donald). Equals arrival record.

**Common Snipe**—Wintered Grant Co. (Smith); other reports Jan. 23-28 Brown Co. (Columban, Cleary), Dane Co. Feb. 28 (Auler), Kenosha Co. Mar. 6 (Hoffmann).

**Herring Gull**—Wintered Lake Michigan and Lake Superior; inland reports Dane Co. Feb. 15 (Auler), St. Croix Co. Feb. 28 (Tweet).

**Ring-billed Gull**—Wintered Lake Michigan; arrived Dane Co. Mar. 3 (Auler), Grant Co. Mar. 2 (Smith).

**Bonaparte's Gull**—Arrived Fond du Lac Co. Mar. 3 (Knuth)—documented report of an individual in winter plumage is a record early arrival. Previous record Mar. 19.

**Great Black-backed Gull**—Milwaukee Co. Mar. 1 (Donald, Basten).

**Thayer's Gull**—Milwaukee Co. Mar. 14 (Donald, Erickson). First state record, see "By The Wayside."

**Glaucous Gull**—Wintered Milwaukee Co. (many observers).

**Mourning Dove**—Wintered Milwaukee Co. (many observers).

**Mourning Dove**—Wintered north to Winnebago, Portage and Barron Cos.

**Ringed Turtle Dove**—Remained Milwaukee Co. to Jan. 3 (Donald).

**Snowy Owl**—Numerous sightings statewide.

**Long-eared Owl**—Wintered Milwaukee Co. (many observers); seen Dane Co. Jan. 25 (P. Ashman).

**Short-eared Owl**—Wintered Milwaukee Co. (many observers); seen Grant Co. Jan. 6 Feb. 6 (Smith), Dane Co. Mar. 31 (Seymour).

**Belted Kingfisher**—Wintered Portage Co. (Baumgartner), St. Croix Co. (Tweet), and Grant Co. (Smith); seen Milwaukee Co. Jan. 27 and Mar. 15, Waukesha Co. Feb. 15 (Bielefeldt).

**Common Flicker**—Wintered Grant Co. (Smith); seen Milwaukee Co. Jan. 16; arrived Fond du Lac Co. Mar. 2 (Knuth), Kenosha Co. Mar. 5 (Hoffmann).

**Red-headed Woodpecker**—Wintered north to Portage and Chippewa Cos. "several" (Robbins). Seen Oconto Co. Jan. 5 (Woodcock).

**Yellow-bellied Sapsucker**—Wintered Kenosha and Milwaukee Cos.

**Eastern Phoebe**—Arrived Grant Co. Mar. 28 (Smith).

**Horned Lark**—Wintered north to Oconto and Taylor Cos.

**Tree Swallow**—Arrived Grant Co. Mar. 28 (Smith), Dane and Jefferson Cos. Mar. 31 (Tessen).

**Black-billed Magpie**—Remained Milwaukee Co. to Jan. 6 (Donald and others).

**Red-breasted Nuthatch**—Wintered statewide in small numbers.

- Brown Creeper**—Wintered north to Barron and Vilas Cos.
- Winter Wren**—Arrived Milwaukee Co. Mar. 10 (Herbert, Idzikowski), Dane Co. Mar. 31 (Tessen).
- Mockingbird**—Milwaukee Co. Mar. 10 (many observers).
- Curve-billed Thrasher**—Wintered Buffalo Co. (Maier).
- Brown Thrasher**—Wintered Milwaukee Co. (Donald), Brown Co. (Columban and Cleary); seen Ozaukee Co. Feb. 7 (Bintz).
- American Robin**—Wintered north to Brown and Portage Cos.; seen Langlade Co. Mar. 7 (Pickering) and Barron Co. Mar. 25 (Faanes); big migration first week in March.
- Hermit Thrush**—Wintered Milwaukee Co. (Otto); arrived Grant Co. Mar. 28 (Smith).
- Eastern Bluebird**—Arrived Grant Co. Mar. 3 (Smith), La Crosse Co. (Rosso) and Portage Co. (Baumgartner) Mar. 6.
- Golden-crowned Kinglet**—Wintered Milwaukee, Waukesha, and Dane Cos.; late January reports from Fond du Lac, Portage, and Winnebago Cos.
- Ruby-crowned Kinglet**—Arrived Brown Co. (2) Mar. 20 (Cleary and Columban).
- Cedar Waxwing**—Wintered north to Sheboygan Co.; arrived Bayfield Co. Mar. 16 (Bratley).
- Northern Shrike**—Wintered statewide, many reports; last seen Brown Co. Mar. 26 (Cleary and Columban).
- Yellow-rumped Warbler**—Dane Co. Jan. 26 (Tessen), Grant Co. Jan. 13-26 (5 Jan. 22) (Smith).
- Meadowlark spp.**—Wintered in southern third of state; influx statewide first week in March with both species singing.
- Red-winged Blackbird**—Wintered Kenosha, Milwaukee, Dane, and Brown Cos.; big movement Mar. 3-7.
- Rusty Blackbird**—Wintered Brown Co. (Columban, Cleary); arrived Jefferson Co. Mar. 7 (Sharp).
- Brewer's Blackbird**—Arrived Jefferson Co. Mar. 3 (Sharp).
- Common Grackle**—Wintered Milwaukee, Dane, La Crosse, Brown, Vilas, and Grant Cos.; big movement Mar. 2-7.
- Brown-headed Cowbird**—Wintered Milwaukee and Dane Cos.; seen Feb. 15-19 Brown Co. (Cleary, Columban); arrived Langlade Co. Feb. 25 (Pickering).
- Black-headed Grosbeak**—Rock Co. Mar. 23-31 (Staab). This is the third state record for this species and it has been documented with photographs.
- Evening Grosbeak**—Wintered south to Juneau Co.
- Purple Finch**—Wintered statewide, but not very abundant.
- Pine Grosbeak**—Only report (3) Bayfield Co. Jan. 22 (Bratley).
- Common Redpoll**—Wintered statewide; good flight second week in January and remained to end of period.
- Hoary Redpoll**—Ten well-documented reports statewide.
- Pine Siskin**—Wintered statewide, with and influx noted in mid-January.
- American Goldfinch**—Wintered north to Barron, Oneida, and Vilas Cos.
- Red Crossbill**—Numerous reports statewide.
- White-winged Crossbill**—Wintered statewide with many reports.
- Rufous-sided Towhee**—Wintered Dane Co. (many observers); seen Milwaukee Co. until Jan. 28 (Donald).
- Vesper Sparrow**—Seen Dodge Co. Jan. 27 (Koopman).
- Dark-eyed Junco**—Wintered north to Vilas (Thomas) and St. Croix Cos. (Tweet).
- Tree Sparrow**—Wintered north to Vilas and St. Croix Cos.
- Field Sparrow**—La Crosse Co. (3) Jan. 27-39 (Leshner), Buffalo Co. Jan. 27-Mar. 5 (Maier), and Grant Co. Jan. 29-Mar. 31 (Smith) (6 on Feb. 22).
- Harris' Sparrow**—La Crosse Co. Feb. 25-Mar. 31 (Leshner).
- White-crowned Sparrow**—Wintered Kenosha Co. (Tessen) and La Crosse Co. (Leshner).
- White-throated Sparrow**—Wintered Milwaukee Co.; seen Feb. 9 Grant Co. (Smith), Mar. 5 Kenosha Co. (Hoffmann), and Mar. 14 Dane Co. (T. Ashman).



**Fox Sparrow**—Arrived Dane Co. Mar. 3 (Auler).

**Swamp Sparrow**—Three reports: Sauk Co. Jan. 15 (Hilsenhoff), Dane Co. Jan. 26 (Tessen), and Kenosha Co. Mar. 5 (Hoffmann).

**Song Sparrow**—Wintered north to Ozaukee Co. (Bintz); arrived Winnebago Co. Mar. 6 (Natzke).

**Lapland Longspur**—Several reports statewide north to Langlade Co. (Pickering).

**Snow Bunting**—Wintered south to Rock and Walworth Cos. (Tessen, Hilsenhoff).

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## By the Wayside...

### Thayer's Gull in Milwaukee Harbor

On March 14, 1974 Mary Donald and I were watching about 80 gulls near us circling over the water. Suddenly I saw one all white underneath, including all the way to the wing tips. The head and tail were all white, the mantle grey, the wing tips dark grey with white spots (no black), feet pinkish. Meanwhile Mary found him and reported the bill all yellowish. We both watched for some time. He came close enough for us to see that the eye itself was dark. All in all we watched him about 15 minutes as close as 60 feet. The sky was cloudy, but visibility was clear to the horizon. The gulls were all flying and circling together—mostly Herring Gulls waiting for some food from a nearby restaurant. This gull appeared to be slightly smaller than the Herring. The best description and wing views are in *The Birds of Canada*. The size of this gull is "like a small Herring Gull". This book shows two wings for the Thayer's Gull, one exactly as we saw it.—Louise Erickson, Racine

### Gyr Falcon at Green Lake County Park

On March 20, 1974, 2:30 p.m., cloudy, a little snow here and there. A large hawk was flying ahead of us over a bridge of land between the lake and the large marsh to the southwest. He seemed to be the size of a Red-tailed Hawk approximately. He was all whitish under the body and under the wings. The wing tips showed some blackish. His tail was long and the wings were pointed—a huge falcon. We knew we had never seen this hawk before. Tail very long and straight. The head seemed large. Flight was slow and steady, but he moved fast. He flew over us about 100 feet for 2 blocks and then flew left low over the marsh and disappeared. When he dipped slightly one could see dark on the head and cheeks. Watched about 10 minutes.—Louise Erickson and Mary Donald

## **European Siskin ? at Buffalo**

We first spotted the odd yellow siskin on Feb. 3 and our first impression was a possible Cape May Warbler. At the time we were feeding over 800 birds, about 300 of which were Pine Siskins, so we had plenty of birds to compare with. But when this yellow bird came in to feed, one had no trouble locating it in the crowd—it was that yellow. The neck had a bright yellow collar with a pronounced rusty cheek patch. The rump was bright yellow and brighter yellow wing bars than others—all over its body was a yellowish cast (all of the Pine Siskins were yellow green). The striping was identical to Pine Siskins, but our impression was that the bird was slightly larger than the others—perhaps longer tail or a different stance—noticeable at least.—Lorena and Merton Maier, Buffalo City, Wis.

## **Pine Siskin in Aberrant Plumage**

Among the Pine Siskins at my feeder on March 17 was one in which the brown pigment was very pale and the streaks were indistinct. The general effect was of a bird with pale beige upperparts and whitish underparts. The yellow in the wings and tail appeared to be the only normal colors in the plumage and the only clue to the bird's identity. Judging by the amount and intensity of the yellow the bird was apparently an adult male. I tried for photographs of the bird, but they were not processed at the time this report was written. The bird did not turn up at any other time among the flock of siskins at my feeder, so there may have been a continual turnover in the local siskin population.—John Woodcock, Mountain

Editor's Note: There is a tremendous range of variation in the amount of yellow in the plumage of Pine Siskins, from a brown dingy to a very yellow marked bird.

## **Late Nesting of Cardinal**

Dr. Henry Barge of La Crosse checked a cardinal nest in his backyard, and found it had 4 eggs on September 11th, 1974. Three of these hatched on September 15th; 1 nestling died and the 2 fledged on September 24th. During the nestling period nighttime low temperatures ranged from 34 degrees to 59 degrees, with an average of 47 degrees. By figuring 12 days for incubation and 4 days for egg-laying, the first egg was laid on August 31st. This is an exceptionally late breeding date. Howard Young.

# **Exotic Swans at Middleton**

SPECIES: Mute Swan

NUMBER: 1

LOCATION: We observed the specimen at Graber's Pond Conservancy Area (Nature Preserve) Area in Middleton, Wis. It was also observed by us and by local residents in a flooded field adjacent to an out-lying residential area about ½ mile from Graber's Pond.

DATES SEEN: Specimen observed on June 18, 21, 22, 27, 30 and on July 4, 5, 7, 9 and 10, 1974.

**DESCRIPTION FROM OUR FIELD OBSERVATIONS:** The specimen is a large pure white swan with an orange bill sharply outlined in black; black tip and nail; black nostrils; black around upper base of bill and extending back along lore, coming to a point at the eye; black along edge of lower mandible. A small but unmistakable black knob is visible in the middle of the base of the bill and protrudes down the center of the bill. Neck is often but not always held in a graceful S-curve. Bill is nearly always held pointed downward at about a 45-degree angle rather than horizontal. Specimen has dark feet. Tail sweeps upward. Never observed raised secondaries.

**VOICE:** Never heard voice.

**BEHAVIOR:** We observed the swan only on water. We saw it swimming, feeding by dunking its head, preening and sleeping. It seems rather tolerant of people—at least at a distance, for it spent many hours in a flooded field adjacent to the backyards of local residents. We have not yet seen it fly but some friends saw it fly off when we left briefly to make a phone call. (Indeed, the direction of flight led us to discover its "home-base": Graber's Pond.) And it was commuting almost daily between the pond and the flooded field.

**HABITAT:** The swan has been living for a least three weeks (that we know of) in a moderately secluded marshy pond. The pond is probably not more than 100 yards long. There are also Coots with young, Pied-billed Grebe with young and several Ruddy Ducks with young.

**IDENTIFICATION:**

- A. The vivid orange bill at once rules out an **adult** Whistling Swan or Trumpeter Swan.
- B. The strong white color argues against this specimen being an **immature** of any species.
- C. In any event the specimen seems not to be an immature Whistling Swan because:
  - 1. The bill of this swan is orange rather than pink or fleshy colored as in the **immature Whistling**.





2. The base of the bill is outlined in black. I understand this is not the case in the immature Whistling.
  3. The bill is not usually held horizontally but closer to a 45-degree angle.
- D. The specimen seems not to be an immature Trumpeter Swan because:
1. The feet of this specimen are dark rather than "dull yellow".
  2. Bill has exact appearance of a Mute Swan. Bill of immature Trumpeter seems to be somewhat different.
- E. Finally, the presence of a modest but clear and unmistakable black knob on top of the base of the bill should be decisive since the Mute Swan is the only North American swan with this feature. (Swans by J. J. McCoy, p. 76 )

**DISTANCE:** Closest approach around 200 feet (eye estimate).

**OPTICAL EQUIPMENT:** 10x50 Bushnell binoculars; 7x15x50 Sears binoculars; 80mm 23x75x telescope we constructed from high quality optical components; 150mm 45x140x Dynascope telescope (astronomical).

**LIGHT:** We observed under a variety of conditions: sun low behind, low in front, overhead, bright sunlight, heavy overcast, etc.

**PREVIOUS EXPERIENCE WITH SPECIES:** None with this species. We observed 8 adult Whistling Swans at Goose Pond on Easter Sunday 1974—but at a substantial distance.

**OTHER OBSERVERS:** At the suggestion of Dr. Charles Kemper, the Editor of "Passenger Pigeon" I contacted Mr. and Mrs. Roy Lound of Madison. They agreed to examine the specimen and concluded that it was a Mute Swan "without doubt".

**SOURCES:** We relied mainly upon **Birds of North America** by Robbins et al. Also consulted **Swans** by J. J. McCoy.

**PHOTOGRAPHS:** A number of photographs were taken with an Olympus Pen single lens reflex camera ( $\frac{1}{2}$  frame) mounted on our 80mm telescope with 23x lens giving 850mm equivalent focal length (about f/11). Photos taken on Kodacolor II print film at  $\frac{1}{250}$  of a second. According to **Birds of Wisconsin** by Gromme the Mute Swan is a "hypothetical" species in Wisconsin for lack of adequate photographic documentation. I hope that these photos and others still being processed will aid in documenting the Mute Swan.

The photographs were taken on July 13, 1974 (in 97° heat—a nine year record) from the edge of Graber's Pond (Nature Preserve) through a reflecting telescope of 6" aperture at 45x giving an effective focal length of 1,700mm. Our main concern was to "capture" the distinctive black "knob" (which was small, indicating that the swan was probably female).

**CINE-PHOTOGRAPHY**—As we mentioned in our earlier report, the swan was seen flying by friends and others—but never by us. However, in talking with local residents we discovered an 8mm film of the swan taken several days after it arrived, which provoked the swan into flight. So we finally saw the swan fly—on film.

**TOTAL TIME IN AREA**—We talked with local residents to supplement our own observations and concluded that the swan arrived in the 1st or 2nd week of June. It left on Aug. 12 or 13 so it lived on Graber's Pond for about 9 weeks.

**THE ORIGIN OF THE SWAN**—We have been concerned about the origin of this swan (whether it could possibly have been artificially introduced into the pond) especially with the appearance of a 2nd even more unusual swan discussed below. So we checked the most likely candidates: the Middleton Park System which cares for the Nature Preserve, the Graber Company and another company that border the Preserve. They had no knowledge of the swans. Finally, the Madison Public Zoo has swans but none have escaped.



We periodically checked Graber's Pond to see how long the Mute Swan would stay here. We had last checked on Aug. 6. Then on Aug. 11 some friends, Roy and Marlene Messling of Madison, stopped at Graber's Pond on their way to visit us. They found a Black (Australian) Swan alongside the Mute Swan. They informed us at once and we went to the Pond and confirmed it (black, vivid red bill, white tip). Our reaction was a mixture of astonishment and wonder about their origin. We decided to photograph first and ask questions later. We took about a dozen photographs under poor conditions. We had hoped to get better photos later (and visual confirmation by others) but the next day it rained and when we returned the day after (Aug. 13) both swans were gone. They never came back.

Later we talked to a farmer whose field borders the Pond and concluded that the Black Swan had been there for only a few days.

**THE PHOTOGRAPHS:** We shot a dozen slides of the Black Swan on July 11, 1974. We used a telescope of 3" aperture which was inadequately mounted so it had to be partly hand-held causing considerable camera shake.

Enclosed are **three prints made from the best slides**. Photo 1 and Photo 2 were taken at 23x (effective focal length 900mm). The Mute Swan is rather over-exposed in these prints. Photo 3 was taken at 45x (effective focal length 1,700mm). Although the photo suffers from camera shake and a slow shutter speed the Black Swan is easily identified.

Karl & Dorothy Legler  
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**EDITOR'S NOTE:** This article is a beautiful model of how to document a rare sighting. Actually since publication of Gromme's book, there have been several other sightings of Mute Swans in The Passenger Pigeon.

The occurrence of an Australian Black Swan in the same pond is truly weird. The origin of this swan most certainly had to have been an escapee from a zoo, public park, or private estate.

# **Waterfowl In Waukesha County, Wisconsin: Spring (Loons, Grebes, Ducks, American Coot)**

By JOHN BIELEFELDT

As to the numbers of dowitchers that frequented Lake Koshkonnong thirty to thirty-five years ago . . . we forbear to attempt an estimate, as the younger generation would set it down as fabulous.

So hesitated Kumlien and Hollister (1951:35) in writing of the 1870's. Such powers of restraint were indeed widespread among Wisconsin's early ornithologists, who described birds as "exceedingly abundant" or "not uncommon" or "more plenty than the next" but seldom attached any number except to the rarer species. It is all very well to know that Benj. F. Goss was able to take an egg of the loon at Waukesha county's Pewaukee Lake during the 1860's ("Some Wisconsin Bird Specimens . . .," 1942), yet how many Black Terns were breeding there where none do now? A. R. Cahn (1913), poised halfway between the present and the virgin days of Thure Kumlien's arrival in the state, would say only that "occasional" Prairie Chickens might still be found "in the more secluded parts" of Waukesha county. What can one make of that "occasional" when ten years later, in the chickens' last local stronghold not one mile from the spot Cahn frequented, Christmas counters could list 65 of these grouse?

A large portion of generalization can of course be forgiven the pioneer birdmen, and even as they frustrate, those broad descriptions enhance dreams of olden abundance. Each succeeding corps of observers, however, has less and less excuse for failing to document the numbers of every species. In 1916 when S. Paul Jones began his 40 years of local fieldwork barely 40,000 people lived in Waukesha county, fewer than half of them in cities; by 1970 there were 231,000 inhabitants, four-fifths of them urban. This booming population ate away almost exactly half of the 1920 farm acreage by 1969. What was an agricultural landscape is steadily turning to lawn, and still there are naught but broad notions about the numbers of the common and typical birds of rural Waukesha county. Only the grossest changes in abundance since Jones' early years—the disappearances and decimations—can be confidently identified.

This discussion of waterfowl and their associates is part of a larger investigation which seeks to establish some basis for judging future changes in area birdlife. Local study can both substantiate state findings and reveal regional differences. The main justification here is the ongoing transformation in human demands on the county environment. Residential, commercial, and recreational uses of lands and waters must certainly continue to expand in this vicinity, one of Wisconsin's most rapidly "suburbanizing" areas. Prudence in preserving natural features has begun to appear, but local wildlife populations will become greatly altered over the next few decades.

The numbers of ducks and coots are already rather well known because of their game bird status. More extensive local data for spring are quite subsidiary to the established statewide facts, although the other species included here are not so well researched. (Summer, fall, and winter abundances each present a set of problems which differs from that of spring and generally requires more counting.) Despite their taxonomic diversity, however, all these water birds tend to form a group alighting and mingling, more or less, on the same lakes, marshes, and ponds. Table 1 summarizes the general types and acreages of these county wetlands, excluding those with woody vegetation (mostly willow/dogwood shrub swamps).

TABLE 1. TYPES AND ACREAGES OF WAUKESHA COUNTY  
WETLANDS AND LAKES

	No. areas	Total acres
Wetlands (1956) <sup>a</sup>		
Sedge meadow ( <i>Carex</i> ) .....	806	17,596
Marsh ( <i>Typha</i> , <i>Cyperus</i> ) .....	457	9,690
Lakes (1963)		
10-99 acres .....	49	1,588
100-499 acres .....	16	3,602
500+ acres .....	7	9,350
Rivers (1963) .....	—	784
<b>TOTAL</b> .....	<b>1,335</b>	<b>42,610</b>

<sup>a</sup>Includes open water if total size of the wetland and water area was less than 10 acres. There may be 40 to 50 such cases; in turn, many of the wetlands abut large-lake or river waters.

Sources: Poff and Threinen, 1963: **Waukesha County Wetlands, 1960.**

While more than a tenth of county surface is potential wildfowl habitat, several factors do limit the utility of those 42,000 acres. The sedge meadows, seasonally flooded at best, provide breeding but rather little resting or feeding area. Homesite development, which had carved out about one-third of county lakes' shorelines by 1962 (Poff and Threinen, 1963:49), as well as high recreational use and raised water levels that destroy shore marshes, must have much adverse effect on waterfowl. Wetland grazing—some 10,000 acres in the 1950's (**Waukesha County Wetlands, 1960**)—has fortunately fallen off with the decline of local dairy herds. Outright destruction through drainage and filling should now be nearly ended.

The distribution of waters is far from uniform. The county's north-western part has a majority of the lakes, and of their acreage, and half the extent of marshland. Rivers in these four or five civil townships connect with the Rock in Jefferson county. The remainder of the county drains south to Illinois or east to Lake Michigan. The affinities of transient ducks may or may not parallel these watersheds, but two spots in the eastern county provide especially noteworthy waterfowl habitat—the 2,000 plus acres of Big Muskego Lake and adjacent marsh, and the 7,000 acres of Vernon "marsh", mostly sedge meadow. Quantitative information is lacking, however, from even these most significant of eastern wetlands, and the prime source of data tabulated here is a parcel of the major

northwest county lake region—all of Summit and Ottawa townships plus slim adjoining strips and the Pewaukee/Nagawicka Lakes sector, or approximately 90 square miles altogether.

This observation area comprises a one-third to one-half acreage sample of all water and wetland categories in Table 1 except the sedge meadows. It is thus a good sized representation portion of county habitat, although naturally not all wetlands within the area, particularly the off-road marshes, could be adequately covered. The main spring field sample comes from 58 waters checked with varying regularity. Of these, 22 were lakes larger than ten acres, 29 were smaller lakes or were marshes, and 7 were flood ponds of annual accumulation.

## Methods

Since 1965 the author has recorded every visit to all areas of open water as well as the identifiable species and numbers of waterfowl seen at each. A basic knowledge of waterfowl habits, simple field inventory of marshy or marsh-fringed areas, published material on lake sizes and depths, and most of all experience with the actual occurrences of the birds allow a subjective but reliable classing of the waters suitable for each species' use. These distinctions follow the premise that numbers in favored habitat are the best measure of abundance. In practice this approach mostly means separating, with the much overlap, the waters suitable for dabbling ducks from those suitable for diving birds. Several finer discriminations are also possible among the latter birds.

The sole ubiquitous, species is taken to be the Pied-billed Grebe, which in migration will sometimes occur from the shallowest flood pond to the biggest lake. The most restricted are the Common Loon and the Horned Grebe, which use only 13 deeper lakes in the sample; sheerly by accident would they show up elsewhere.

Thus for each species seen annually, the 1965-1974 data and occasional 1965-1964 observations of the same sort can be formed into two indexes for every 10-day subdivision of the spring migratory period:

- 1) frequency—percent of occurrence in visits to suitable open water areas; and
- 2) density—average number per visit to suitable open water areas.

From those figures it is usually easy to pick out a month or more span of substantial migration (rather than isolated or irregular transience), normally March 21 to April 30. The appropriate subdivisional indexes are then averaged in order to give each 10-day period equal weight, producing the seasonal frequencies and densities of Table 2. That table also shows for every annual species the main migratory span and the total visits to suitable open waters within that span. In most cases a species presumed habitat tolerance can be approximated by contrasting its "visits" figure to that of the Pied-billed Grebe.

## Results

Densities are the primary measures of Table 2. They order the 23 annual species from most to least abundant by portraying average num-



bers over eleven or more years and minimizing any yearly vagaries in migration routes or timing. Moreover, the "suitable area" method obviates any field favoritism toward a particular kind of water habitat. Many individuals were counted two, three, or more times in a single season because of repeated visits to the same waters, but this is a normal feature of the method and theoretically should not deform indexes.

However, some birds were overlooked or unidentifiable on many occasions despite frequent use of a 20x scope. The density results accordingly approach rather than equal real numbers. They do remain a satisfactory description of relative numbers within preferred habitat, if a similar proportion of birds went uncounted for each species. One difficulty still exists. A bird like the Redhead may be seen occasionally in large numbers while another like the Bufflehead is widespread in small numbers. They are roughly equal in density but the frequencies of Table 2 demonstrate the difference.

TABLE 2

RANK ABUNDANCE OF ANNUAL WATERFOWL DURING MAIN SPRING MIGRATION PERIODS, NORTHWEST WAUKESHA COUNTY, 1961-1964

	Period	Visits To Suitable Open Water Areas	Frequency	Density
Lesser Scaup				
Aythya affinis .....	3/21-4/30	691	34.7	7.42
Ring-necked Duck				
Aythya collaris .....	3/21-4/30	691	27.4	3.75
American Coot				
Fulica americana .....	3/21-4/30	691	12.9	2.71
Red-brst. Merganser				
Mergus serrator .....	3/21-4/30	320	21.3	2.62
Blue-winged Teal				
Anas discors .....	4/ 1-5/10	599	39.2	1.80
Com. Goldeneye				
Bucephala clangula .....	3/11-4/20	571	26.6	1.60
Mallard				
Anas platyrhynchos .....	3/11-4/10	365	31.4	1.41
Redhead				
Aythya americana .....	3/21-4/30	576	10.4	1.24
Com. Merganser				
Mergus merganser .....	3/ 1-4/10	306	16.0	1.22
Bufflehead				
Bucephala albeola .....	3/21-4/30	576	27.8	0.95
Ruddy Duck				
Oxyura jamaicensis .....	3/21-4/30	576	9.1	0.84
Canvasback				
Aythya valisineria .....	3/21-4/30	576	6.8	0.83
Horned Grebe				
Podiceps auritus .....	4/ 1-4/30	200	13.3	0.66
Pied-billed Grebe				
Podilymbus podiceps .....	3/21-4/30	736	21.9	0.54
Hooded Merganser				
Lophodytes cucullatus .....	3/21-4/20	367	13.3	0.48
American Wigeon				
Mareca americana .....	3/21-4/30	661	11.1	0.48
Green-winged Teal				
Anas carolinensis .....	3/21-4/30	661	6.4	0.41
Common Loon				
Gavia immer .....	4/ 1-4/30	200	21.3	0.34

	Period	Visits To Suitable Open Water Areas	Frequency	Density
Northern Shoveler				
<i>Spatula clypeata</i> .....	3/21-4/30	661	7.7	0.34
Black Duck				
<i>Anas rubripes</i> .....	3/11-4/10	400	7.1	0.22
Wood Duck				
<i>Aix sponsa</i> .....	3/21-4/30	661	8.0	0.21
Pintail				
<i>Anas acuta</i> .....	3/21-4/30	661	2.3	0.07
Gadwall				
<i>Anas strepera</i> .....	3/21-4/30	661	2.4	0.05

A tendency to occur in larger flocks (or concentrations in which subsidiary flocks are not apparent) reduces the reliability of density figures, since any single observation carries more numerical weight. For 1961-1973 data, the 95 percent confidence intervals for density ranged up to  $\pm 106$  percent in the Canvasback and down to  $\pm 32$  percent in the Blue-winged Teal; most species ran in the  $\pm 50$  to 70 percent range.

Also, conspicuous aggregations can surely color a subjective view of relative abundance. This factor might enter some descriptions of Barger et al. (1960), who used "apparent" numbers within preferred habitat in applying their statewide status terms. That possibility is considered below, yet local statuses still sometimes dispute state conclusions, which necessarily merge spring and fall abundance. Barger and his co-authors did set forth very workable definitions of four abundance classes among annual species, and their sparing use of "abundant" and "uncommon" is supported by patterns of these quantitative data. (They specified abundance within the family, separating loons from grebes from ducks from the coot, but it is desirable to combine all here.) In brief, using their categories and remembering that these are strictly local conclusions for spring alone, Waukesha county studies show that state descriptions:

- 1) rate too many species abundant since the Lesser Scaup stands apart, far above the rest;
- 2) overrate the relative numbers of all dabbling ducks except the Green-winged Teal and Northern Shoveler;
- 3) underrate the Red-breasted Merganser, which is here more numerous than the Common Merganser;
- 4) vastly underrate the Bufflehead, which is not "uncommon" here but instead ascends well into the top half of the abundance ranking;
- 5) overlook its restricted habitat and so fail to accord the Horned Grebe the equality it locally deserves with the Pied-billed Grebe.

Abnormally early arrivals and laggard departures have little bearing on standards of numerical abundance and must go unremarked. Most species sometimes appear within the first two weeks of March and nearly all have stayed at times into late May. A few regular species nevertheless demand comment of one sort or another on their spring occurrence. This review also includes notes on the seven rarer species which have been recorded in the county in spring.

**COMMON LOON**—This loon is the only one of the waterfowl to offer good evidence of recent decline in Waukesha county transience. As such a bit of detail is necessary. Within its narrow habitat of large lakes the common loon is currently quite frequent, high in fact among all waterfowl, but the usual sighting is a solitary bird, with three and six the largest groups in these studies. Density therefore stays low. During nine days afield in prime early April migration time of 1966, for example, loons were seen at five of the eleven lakes they might conceivably use, averaging 0.37 per visit to those eleven (N-51). Probably twelve distinct individuals were involved, or just one for every suitable lake.

S. Paul Jones' county observations before 1950 (MS) make a very tempting inferential case for much higher numbers then. On at least five occasions he found 12 to 50 loons at a single lake; once he totalled 75 at several lakes in one day. From 1922-1935 a mere eight trips afield between April 1 and 20 produced at least 259 distinct individuals, while twenty trips yielded a repetitive grand count of 408 loons, and Jones went afield only 71 times in that April period in those years. He did not tally lake visits, but to bring his average down to the present levels he would have had to check more than eleven suitable waters every time afield—a quite unrealistic amount of sustained effort and travel. The author's eight best days might muster 50 loons in total during observations specifically aimed at waterfowl.

**RED-THROATED LOON** (*Gavia stellata*)—Available records for May 12, 1929 (Jones, MS), and for April 19, 1965 and April 8, 1966 (Bielefeldt, MS), all single birds, probably underestimate the frequency of this loon's spring stops on the biggest county lakes.

**RED-NECKED GREBE** (*Podiceps grisegena*)—The one modern record is a full-plumaged bird April 18, 1965 (Bielefeldt, MS). Cahn's second-hand reports (1913) of a small flock in 1912 and birds in "other years" might be questioned.

**EARED GREBE** (*Podiceps caspicus*)—One to three from April 8 to 15, 1964, seen by Mary Donald (Pass. Pigeon 27:28), constitute the county's sole spring record beyond an undocumented 1965 report.

**MALLARD**—All figures presented here omit visits to and mallards at the Pabst Condensary Pond and two nearby marshlands (Section 11, Township of Summit) where a substantial flock of Pabst' winterers often congregate in early spring. Other winter birds in years of late warming are also excluded.

**BLACK DUCK** and **PINTAIL**—Jones, Anthes, and the Nelsons (MSS) have previously found both these species in county numbers more consistent than the author's data with the "common" spring position usually assigned in Wisconsin. The reason for this contrast is not apparent.

**CINNAMON TEAL** (*Anas cyanoptera*)—One county bird of this western teal was well described for April 28, 1973 by V. Aune (Pass. Pigeon 36:35-36).

**WOOD DUCK**—Wood duck figures in Table 2 are believed to depend largely upon local breeders, not transients, and furthermore upon that minor share of breeders which uses the open marshlands primarily cen-

sused here. Both summer and fall data suggest that this duck is much more numerous than spring sightings can indicate. It is theorized that northbound transients rarely stop locally. Groups of 10 and 17 birds on March 20 and 26, 1966—easily the biggest spring flocks seen in these studies—may represent migrant timing and behavior. They occurred in severe weather and disappeared when it passed.

**GREATER SCAUP** (*Aythya marila*)—No sensible guess at the county status of this scaup is possible. Apparently no one aims at or succeeds in picking it regularly from among the many lesser scaup. It might be annual in a region with several big lakes only 30 or 40 miles from Lake Michigan, although the oldsquaw—often abundant at Milwaukee—remains very rare here. Jones (MS) did feel that five scaups on April 5, 1945 were greater. Other spring reports are lacking.

**COMMON GOLDENEYE**—In some years there are certainly mid-February arrivals in this goldeneye, perhaps even late January ones (taking care to eliminate dispersals after late winter thaws). Jahn and Hunt (1964) contend that these and early March birds are true migrants. The premiere local case involved  $600 \pm 100$  crowding onto five acres of open water at Lac LaBelle, March 6, 1966. This thoroughly unprecedented flock is not incorporated in Table 2; it would roughly double seasonal density. Numerous other migrants of March 1-10 are also excluded, since they often arrive before spring melt and overinflate density by concentrating at the few available patches of ice-free water. Known wintering birds during late springs are likewise left out of calculations.

Immatures of changing plumage are especially noticeable in male goldeneyes. During five recent springs, eleven percent of 125 separate males were identifiably immature, and some others were probably passed as females. If the sex ratio among all goldeneyes and among year-old goldeneyes is much like that of most adult *Aythya*—circa 63 percent males (Zimmerman, 1961; Bellrose et al., 1961; Bielefeldt, MS)—then year-old birds of both sexes should compose at least one-sixth of locally observed spring goldeneyes.

**OLDSQUAW** (*Clangula hyemalis*)—Remarkably few of Lake Michigan's oldsquaws have made the short inland flight to Waukesha county. Cahn (1913) reported twelve on March 27-28, 1912, and one appeared April 2, 1964 (Bielefeldt, MS). A county record for April 9, 1964 (**Pass. Pigeon** 27.30) is a transcription or printing error for a Milwaukee sighting (Em Hoffman, pers. comm.).

**SURF SCOTER** (*Melanitta perspicillata*)—Diligent search should eventually prove otherwise, but so far observed scoters of any species are absent here in the spring with one accidental exception—a Surf Scoter seen by several persons on a shallow marsh April 20-21, 1963 (**Pass. Pigeon** 25:164-165).

**HOODED MERGANSER**—This merganser does not attain adult plumage until its second spring, so recognizable males were in the minority (45.2 percent) among 117 distinct local spring birds. Zimmerman (1961) found a statistically similar proportion in his southeastern Wisconsin sample. Assuming that the true sex ratio is much like other ducks' (and

like the red-breasted merganser's), it would appear that yearling hooded mergansers of both sexes composed about one-quarter of the Waukesha county sample.

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*Help Save*

# HABITAT FOR WILDLIFE

*Mary and Charlie Nelson*



# Observations On Foraging of the Common Grackle and Adaptive Incapacitation of Crayfish

CHARLES A. LONG and CHARLES ALAN LONG

Museum of Natural History and Department of Biology  
University of Wisconsin, Stevens Point, Wisconsin 54481

The purpose of this study on foraging behavior in the **Common Grackle** (*Quiscalus quiscula*) originally was to determine whether or not this bird generally removes the pereiopods prior to feeding upon large crayfishes. After such a behavioral pattern became evident, a new and difficult question arose asking whether or not such incapacitating behavior, although obviously adaptive, was merely the random pecking of a bird large enough to tear off the nearest appendages encountered. One hypothesis we considered proposed that the behavior was at least in part a fixed action pattern established by natural selection. The successful procedure for incapacitating formidable crayfishes broadens the semi-aquatic niche. We recognize that the preadaptive size of the bird and length of its bill as well as its preferred habitats of stream, marsh, and meadow have helped establish a strategy of feeding opportunistically on a variety of aquatic and meadow organisms. **Incapacitation** is probably a widespread behavioral phenomenon, and we attempt to give its preliminary definition. Its importance for predators is similar to that of parasite's utilization of a new host.

## Materials and Methods

One burrowing crayfish (*Procambarus gracilis*) was taken from a grackle on 26 May 1972, in wet prairie 8 kilometers west of Lamar, Missouri. This large specimen (length 90 mm.) had been incapacitated by removal of all its eight walking legs and the left antenna. In Pittsburg, Kansas on 1 June 1972, several large- and medium-sized crayfishes (*Orconectes causey* from Five-mile Creek, northeastern Oklahoma) were staked out with two-foot lengths of twine on a lawn where grackles were abundant. The authors observed from concealment. The same procedure was followed in Stevens Point, Wisconsin, in mid-June 1972, using *Orconectes virilis* from the Tomorrow River. In June and early July 1973, we observed Wisconsin grackles along streams, rivers, and on lawns and meadows. We observed for three days three recently captured birds and two juveniles. The cage (1.3 x 1.3 x 2 m) was placed in our shaded yard within view of the house. Large crayfishes, minnows, corn and bread were offered to the grackles, and water was abundantly provided.

## Foraging Behavior

Foods of Grackles include seeds, insects, minnows, crayfish, bats, young birds, and many other items (Bent, 1958: 379-382; Long, 1971). Roberts (1932) described feeding of grackles on crayfish taken struggling from the water, but he did not mention the incapacitation observed by us.

Foraging groups observed were predominantly male adults. The birds moved over the ground of meadows, forest floor, or lawns. Usually two or three kept in advance of the others. All with extreme rapidity seized and flipped over leaves in their paths, thereby uncovering hidden food items. Other birds (Robins, Brown Thrashers) thrashed about in leaf litter, but not species observed by us so effectively and methodically flipped leaves while foraging. Red-winged Blackbirds and Cowbirds, fairly close relatives of Grackles, foraged over open areas (beaches, meadows), but they were far less attentive to leaves.

As mentioned by Bent (1958) and Roberts (1932), Grackles often forage along the shores of bodies of water. We observed Grackles catching dead and sickly minnows by wading into the water and seizing them. A hovering Grackle seized a minnow from the surface of the Wolf River. The captive juvenile Grackles attempted to swallow minnows whole, usually headfirst, and frequently bobbed their heads ineffectively, as do many young birds while trying to swallow large food items. Adult Grackles observed in the wild in every case stepped on the minnow with a foot and while holding the minnow between the mandibles pulled the fish apart by extending the neck and raising the head. One Grackle seen with a large beetle was battering it against the ground, holding its shell in the beak. Grackles occasionally and unsuccessfully attacked young Robins frontally pecking at their heads. Grackles were often successful in stealing food in this manner from young Robins and juvenile Grackles. Such behavior has not been reported to our knowledge.

#### **Observation, Hypothesis and Experimental Results**

After observing the Missouri Grackle feeding upon an incapacitated crayfish, we hypothesized that common Grackles often prey upon large burrowing crayfish and have evolved behavior to incapacitate such prey. Appendages are removed rapidly until after the prey is rendered helpless.

We observed incapacitating behavior of Grackles in Kansas. After hopping up to one crayfish, a male Grackle circled half way around the prey, always facing it, then attacked flipping the pereopods about. Finally the Grackle seized the crayfish by the cephalothrax and attempted to carry the crayfish away (but the thread thwarted the bird. We frightened the Grackle away, and counted three pereopods missing on the left side of the crayfish, a fourth gone from the right. Three Grackles returned, and one circled about half way around the struggling crayfish, and then drove off the nearer of the other Grackles. Again the Grackle "circled" the crayfish and attacked, tearing off a pincer and another pereopod, and attempted to carry off its prey in its beak. Then we chased the birds away. Finally, one Grackle returned and seized the crayfish, tore it loose and carried it about 20 yards away and then much farther away as we gave chase hoping to force the bird to drop its prey.

A single male Grackle hopped up to the second crayfish, circled about half way around it, flipped it about, and attempted to carry it away. One walking leg was found missing. The thread had badly injured the crayfish. The Grackle returned to the crayfish and without circling at all seized the helpless crayfish and attempted to fly away, and eventually carried the abdomen away. The pincers were missing, the cephalothorax smashed. Finally a Grackle returned and carried the remains away.

In Stevens Point, Wisconsin, where Grackles were regularly fed bread at a feeder, we staked out a 90 mm crayfish on the ground amidst numerous pieces of bread. A few Grackles came and took the bread, but they seemed to hardly notice the crayfish. Occasionally we placed the crayfish in water to keep it alive. One Grackle appeared to peck at the crayfish, after a few sideways steps around it, but left with a piece of bread. One large male Grackle finally attacked the crayfish, carrying out the circling phase of incapacitation and then flipping the huge crayfish about several times. We interrupted and found that the distal dactyl of the third pereopod (left side) was missing.

At the end of another 2½ hours of observation, another male Grackle attacked the crayfish, making two preliminary circling movements (but each only a few inches) and then flipping the crayfish about. The actions were not as rapid as seen in Kansas, but they continued until we interrupted the act of feeding (through a torn tergum). Both of the antennae and all of the eight walkings legs were missing. The large crayfish was alive but entirely helpless.

### Observations On Caged Birds

In the hottest part of the day captive Grackles showed infrequent interest in feeding. Caged birds omitted the circling behavior seen in wild grackles although seldom confronting crayfish "head to head". When not sitting quietly with open beaks the caged birds often "paced" back and forth on the floor. One pacing back and forth encountered a crayfish ten or twelve times evoking each time a defensive posture of the crayfish (pincers extended, cephalothorax raised high). This bird, and the other adults as well, occasionally reached around the pincers and "casually" extended the long beak to the vulnerable abdomen of the defensive crayfish. Occasionally the crayfish was attacked a few moments later. In wild birds the circling behavior placed the Grackle in a strategic position to seize pereopods from the vulnerable rear and sides. However, a Grackle apparently is capable of seizing the pereopods or abdomen easily, although defensive postures seemed to prevent attacks in numerous pacing encounters.

Caged Grackles seldom pecked at dead crayfishes. Two Grackles turned over dead crayfishes and then left them. One dead crayfish was found eaten, and none of the pereopods was removed.

Although removal of pereopods from living crayfishes was a general practice, attacking grackles often seized crayfishes initially by the dorsum and turned them over prior to removal of pereopods. This procedure suggests that in unconfined Grackles the same method is at least occasionally used. All pereopods were removed from one crayfish, five legs torn off another, and seven removed from a third. In the last observation, the Grackles placed one foot on the helpless crayfish while pulling flesh from within.

### Discussion

Although foraging behavior is described in some excellent ethograms (Willis, 1973) it is seldom analyzed as adaptive predatory strategy. The

means of obtaining energy are as important ethologically as other factors of fitness (such as reproductive strategies). There is no question that the crayfish is ordinary prey of common Grackles and that they carry out interesting attacks against such formidable prey.

Important evidence favoring a stereotyped action of Grackles is the consistent removal of all or nearly all pereopods. There is no reason why so many pereopods need be removed, for dead crayfish were not treated in this manner. In our observation, six living crayfishes were incapacitated by wild Grackles and three by caged birds. In every single case most or all pereopods were rapidly removed. Thus, nine of the nine crayfishes attacked were incapacitated, and the number of appendages removed (hardly by random pecking) totaled at least 42 appendages. There is little doubt that Grackles have a repetitive behavior of tearing off pereopods of struggling crayfishes.

The Grackle does not merely seize the nearest appendage of the crayfish but instead reaches to a vulnerable area. It does not place one foot upon a dangerous crayfish, as upon a defenseless minnow, but stands back attacking by extending the long neck and bill and seizing with rapidity the appendages at their tips or base and throwing them in all directions (not too dissimilar from its foraging under leaves).

Such incapacitation is obviously adaptive, and some preliminary but unfortunately limited discussion about it is warranted. Aside from examples of the removal of arthropod legs, there seems to be many diverse but somewhat comparable examples of incapacitation. Although there is hardly any evidence for "hamstringing" by wolves (*Canis lupus*) of the formidable moose (*Alces*), such incapacitation by packs of wolves is recorded (Seton, 1926). Seton also describes a simple kind of incapacitation by fishers (*Martes pennanti*), turning porcupines (*Erethizon*) over to attack their vulnerable bellies. The behavior of the parrot fishes (*Scaridae*) is often reported and even filmed showing that the protective spines of sea urchins are removed before predation occurs. (Whether or not this is persistent pulling on the nearest organs available is a separate question from whether or not the procedure adds a food source to the diet of the parrot fish and thereby broadens its niche.) Garry N. Knopf informed me that lizards (*Cnemidophorus*) quickly removed the wings of captured cicadas (*Magicicada*) rendering them helpless. George Schaller (public lecture) reported a temporary but effective incapacitation by cheetahs (*Acinonyx*) tripping of their prey prior to killing by suffocation. Black Vultures (*Coragyps*) do not ordinarily attack livestock or other things but during parturition may mortally injure newborn lambs and pigs, perhaps calves, often by attacking their eyes. Such predation adds to the width of this scavenger's niche (Roads, 1936; Hagopian, 1947).

Thus, the phenomenon of incapacitation is widespread enough to warrant definition, investigation, and comparison to other interesting behavior of predation such as venom paralysis (Tinbergen, 1958) and web-spinning. It is no trivial adaptation that permits predators by stereotyped action to utilize new prey species.

#### ACKNOWLEDGMENT

We thank Dr. Jack P. Hailman, Department of Zoology, University of Wisconsin-Madison, for ideas and suggestions concerning the manuscript.

# BOOK REVIEWS

EMPEROR PENGUIN by Jean-Claude Deguine, Stephen Green Press, 7½ x 10, hardbound. \$6.50.

This is a beautifully illustrated little book which tells a straightforward story of the annual renewal of an extraordinary species. It is an inspiring story—a sort of variation on Jonathan Sea Gull. While Jonathan was a fictional character who is the archtype of the hero who does his own individual thing—Mr. and Mrs. Emperor Penguin are heroic in their devotion to their family and their struggle against the harshest conditions in nature to exist, renew themselves, and maintain their species.

The book is replete with stunning photographs but the price even in these inflated times seems quite steep. —C. A. Kemper

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ORNITHOLOGY AT THE UNIVERSITY OF MICHIGAN BIOLOGICAL STATION and THE BIRDS OF THE REGION by Olin Sewall Pettengill, Jr. Kalamazoo Nature Center, Special Publication No. 1, 121 pp. May 6, 1974.

This publication (a revision copy) was received for review. I presume one may obtain a copy by writing the above center at 7000 N. Westnedge Ave., Kalamazoo, Mich. 49007. No price was indicated. There is a beautiful color photo of a spring male Blackburnian Warbler on the cover. This publication is mainly an annotated check list of the birds of this biological station and its environs—an area in northern Lower Michigan about 25 miles south of the Straits of Mackinac.

It also describes the station and its history. In a way it seems like a college yearbook with mention made of many American ornithologists who were at one time a student or teacher here. An excellent bibliography is included. There is description of the summer activities, even how to make breakfast for a crowd of students on a morning bird hike.

It is an interesting publication and also an inviting brochure to the prospective student and visitor to the Biology Station.

One weakness is the sparsity of fall migration records. This is more or less a blank spot in the annotated check list. No doubt in the future this will be filled in by fall field work. —C. A. Kemper

## Second Restated Articles of Incorporation

Resolved, that the Articles of Incorporation of The Wisconsin Society for Ornithology, Inc., be amended and restated this second time to read as follows: to supersede and take the place of the existing Articles and Amendments.

Article I. Name. The name of the Corporation shall be The Wisconsin Society for Ornithology, Inc., and the address of the Corporation and of the registered agent of the Corporation shall be Phyllis Holz, 125 Kolb Street, Green Bay, Wisconsin 54301; Brown County, Wisconsin. The principal office shall be Green Bay, Wisconsin.

Article II. Purposes. Section I. The purpose of the society shall be to stimulate interest in and promote the study of birds in Wisconsin toward a better understanding of their biology and the basis of their preservation.

Section II. The society shall be empowered to use all lawful methods to carry out the above purposes including, but in no way intending to restrict to, authority to accept gifts of money and both personal and real property, and to lease the same from others; to give, lease or sell its various assets; to join with others, both individual and corporate, including government agencies; to set up trusts, create preserves, and otherwise act to further its general purpose.

Section III. The Society shall be employed to set up an endowment to which all monies received from Life and Patron Membership, together with any gifts, bequests, or devises, specifically directed thereto, shall accrue, with only the interest or earnings from said fund being used, the specific purpose being to improve or increase the society's publications or to further the development of ornithological education in Wisconsin as determined by the Board of Directors. Such fund shall be invested as provided for Trust Funds under the Wisconsin Statutes as now provided or as they may be amended hereafter.

Article III. Membership. Section I. Any person of good character who is interested in bird study may be nominated by a member in good standing and admitted to membership on receiving the approval of the Board of Directors. Such membership may be terminated as provided by the Board of Directors.

Section II. The Society may, at any regular or special meeting, establish various classifications of membership, or change, eliminate or add to classifications already established and may prescribe the annual dues to be paid by the members in order for them to remain in good standing as members of the society.

Article IV. Officers. Section I. The officers of the Society shall be a President, Vice-President, Secretary, Treasurer, and Editor, all of whom shall be elected for a term of one year at the annual meeting of the Society and shall take office on the date of their election and hold the same until their successors are elected.

Section II. The Board of Directors shall be the five above elected officers, who shall be known as the Constitutional Officers, together with such other members, not less than five, who shall be elected to said Board by the Constitutional Officers, as more fully determined by the By-Laws.

Article V. No part of the net earnings of the corporation shall inure to the benefit of, or be distributable to, its members, directors, officers, or other private persons, except that the corporation shall be authorized and empowered to pay reasonable compensation for services rendered.

Article VI. No substantial part of the activities of the corporation shall be the carrying on of propaganda, or otherwise attempting, to influence legislation, and the corporation shall not participate in, or intervene in, (including the publishing or distribution of statements), any political campaign on behalf of any candidate for public office.

Article VII. In the event of dissolution, any remaining assets shall be distributed to organizations organized and operated exclusively for



educational or scientific purposes as shall at the time qualify as exempt organizations under Section 501 (c) (3) of the Internal Revenue Service Code of 1954.

Article VIII. This corporation shall have no capital stock.

Article IX. Meetings. Section I. At least one meeting shall be held during each calendar year. Ten days notice shall be given all members of any meeting.

Section II. At least thirty members of the Society shall be necessary to constitute a quorum for the transaction of business.

Article X. Amendments. The Articles may be amended at any annual meeting by a two-thirds majority of the voting members present, but only after such proposed amendments have been published in the regular publication of the Society which publication shall have been in the mail, addressed to the members, at least ten days prior to the opening of the annual meeting.

STATE OF WISCONSIN )  
COUNTY OF CALUMET )<sup>ss</sup>

The undersigned officers of the Wisconsin Society for Ornithology, Inc., certify that the foregoing amendments to the Articles of Corporation of the said Society were adopted by the assembled members in annual convention by unanimous vote being 120 for and 0 against, on the 23rd day of May, 1971, and that a quorum was present at such meeting. The total number of members with voting rights is 1,000, the number present at the annual meeting was 120, and there were no proxies. The proposed amendments were included in the notice of the meeting, such notice being mailed to the members at least ten days prior to the opening of the annual meeting.

NO CORPORATE SEAL

This instrument was drafted by Attorney Robert W. Lutz.

Rockne Knuth, President

Mrs. David Cox, Secretary

## *How to Apply for the Steenbock Scholarship*

The Wisconsin Society for Ornithology has funds available to use in giving at least one \$100 scholarship each year to persons who need it for education or research in the fields of ornithology, biology, ecology, conservation or similar subjects related to our natural resources.

The award money made available by the will of the late Dr. Harry Steenbock, an eminent biochemist associated with the University of Wisconsin.

High school and college students, or others, may apply for this scholarship. It may be used for attending an Audubon Camp, for attending summer school or other classes in any of the subjects mentioned above, or in undertaking a research project, which will be of benefit to a given community, to wildlife or other natural resources.

WSO is most interested in getting applications from teachers, and workers with such groups as Boy and Girl Scouts, 4H Clubs, and similar groups. Students who are planning to make a career out of the study of some phase of the natural world will also be considered as award material. WSO members should alert persons of this type to the possibility of getting a scholarship from WSO.

Include the following information in the letter of application: Name and address; age; school affiliations or present job; tell how the award money will be spent and why you think your study or research will benefit others.

By April 15, 1975 applications should be sent to:

Mrs. Clara Hussong, 332 Peaupre Avenue, Green Bay, Wisconsin 54301

# Spread-wing Posturing in the Turkey Vulture

By MIKE MOSSMAN

Spread-wing posturing is seen in many bird species, particularly among Ciconiiformes, Pelecaniformes and Falconiformes. Postures vary between species, but in general the bird holds one or both wings away from the body, usually while facing toward or away from the sun. Suggested functions of the spread-wing posture include warming, cooling, drying, rousing ectoparasites, and vitamin D synthesis in oil on the feathers (Kahl, *Auk* 88:715-722. 1971; Mueller, *Z. Tierpsychol.* 30:253-258. 1972).

I observed spread-wing posturing in turkey vultures (*Cathartes aura*) at a communal morning perch in the Baraboo Hills. Vultures assumed two spread-wing postures in direct sun, while perched upright:

- 1) Extended posture: wings extended laterally, usually to almost their full length, and the tail fanned.
- 2) Delta posture: wrists separated from the trunk, with wingtips crossed behind the closed tail. The bird's dorsal or ventral silhouette is heart-shaped. The ventral wing surface is concave, with the body roughly at the focus.

If these spread-wing postures serve to absorb solar radiation, then vultures in the extended posture should face away from the sun. With this orientation the greatest possible surface area is exposed perpendicular to the sun's rays. This exposed dorsal surface is completely dark colored and may be kept at a favorable angle if the bird leans forward as the sun rises. Birds in the delta posture should be observed facing toward the sun; in this position a concave surface, consisting partly of the light-colored ventral surface of the primaries, is exposed to the sun, and solar radiation may thus be reflected directly to the body.

Of 180 observations of turkey vultures in the extended posture, 169 were of vultures facing directly away from the sun. I observed 58 vultures in the delta posture of which 56 were facing directly toward the sun. The difference in orientation is significant ( $X^2 = 193$ , 3 df), and conforms to the above predictions.

Field work was supported by a Steenbock Scholarship and the Joselyn Van Tyne Memorial Fund.

308 S. Dickinson Street  
Madison, Wisconsin 53703



# Letters to the Editor

The Library of the Academy of Sciences of the USSR  
Exchange Department

Dear Sirs:

The Library of the USSR Academy of Sciences is very interested in enlargement of its stock with current periodicals published in your country. We should be grateful if you will be able to send us for knowledge a specimen copy(ies) of publication(s) listed below:

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**FIND THIS BIRD  
ONLY IN  
RACINE**



**GASOLINE STATIONS**

**W. H. PUGH OIL CO.  
Racine, Wisconsin**

September 12, 1974

Dear Sirs:

You have been referred to me as the best authority on birds in this area so hence this query. I've called several people in town here and have been to the library to check but have failed to identify a bird I've seen several times in my backyard. Here is the description:

In size and silhouette it's like a Cardinal, complete with crest, but there the similarity ends. Its head is bright red, more of a scarlet (like a red-headed woodpecker) and the red ends in a V on a snow white breast. The back, wings and tail are a blackish, blue grey and the tail coverts were barred. The beak was yellowish and was a thick typical Cardinal beak.

I don't know if this is a break Cardinal or a mutation of some sort or a different species. We had Cardinals nesting in the neighborhood but you never see any young birds with well defined and brilliant plumage at this stage of their development.

I have corroboration of the above for a couple stopped by the house and the man happened to walk over by the french doors overlooking the back yard. He call to me to ask, "What the heck kind of a bird have you got out here?" I came over and sure enough there it was again. I'd had a hose with a fine spray watering a small flower bed and the bird was hopping around in the spray net over 30 feet away so we both were able to see it well. I described it aloud as he and I stood there just to fix it in my memory, so that's it.

I'd appreciate your comments on this for I've ben a bird watcher all my life and have never been stumped like this before. The several people I've contacted are very interested too for information on the subject. Hoping to hear from you soon.

Lloyd Jacobson  
607 W. Eau Claire Street  
Rice Lake, Wisconsin 54868

P.S.: Saw the bird this A.M. with 3 Cardinals which makes me wonder if it is a freak offspring of regular Cardinals.

Editor's Note: This bird has been seen and photographed (super 8 movie film). It is a Red-crested or Brazilian Cardinal *Paroaria Cristata*, normally wild in Brazil and Argentina and common in Hawaii (introduced). Still present on Feb. 16, 1975. It is likely an escaped cage bird.

\* \* \* \* \*

December 23, 1974

Dear Dr. Kemper:

Several times in the past, since we were successful in having the Mourning Dove placed on the protected list I have contacted people who I thought could do (or have done) an entry to the Post Office Department of a stamp showing a Wisconsin pastoral scene with our "Wisconsin Bird

of Peace" in the foreground. Among those I wrote to was Wisconsin Tales and Trails—but nothing came of the request. How about our Society and your position?

We already have the Passenger Pigeon on the letterheads. Our Mourning Dove resembles it a lot in having the same long pointed tail.

I don't know where the bird on the new postage stamp resembles the Mourning Dove—not its tail, that's certain, and I don't know of any pigeon or dove that has a tail like a night hawk.

How about it—is it worthwhile? For my part I'd buy several hundred stamps—to last me a couple of years in fact.

Gerald E. Lindsay

Ed. Note: A good idea. How about starting with our U. S. senators?

\* \* \* \* \*

October 3, 1974

Dear Charles:

We took our second African Safari in September. As the plane ride is such an exhausting affair, to break it up we stopped at Zurich, Switzerland for a day and a half. After an all night ride with little sleep we reached Zurich at 11:30 A.M. and took a bus tour in afternoon to Mt. Santis, 8600 ft. high, going the last way by cable car. After we had descended we watched the cable car go up and back again and they got stuck in midair for an hour! I would have died of fright. The next day we took another bus tour to Lake Lucerne. It rained all day but the countryside was beautiful with gardens everywhere and flowers, boxes, some houses had them on 3 stories. Saw herds of cows being brought down from summer pasture in the mountains. Food is very expensive in Switzerland, a simple dinner for two, \$30, so it was a good thing we didn't stay long.

There were only 5 of us on our African Safari, Charlie and I, two widows, one from Connecticut and one from England and a 40 year old bachelor from California. He was the best birder of all and soon became teachers pet. We met him and the widow from England on our Australian tour and were happy they were willing to come again with us.

John Williams living in Nairobi was our guide. He is in his 50's, has written the African Bird Guide and Guide to the Parks and is now working on 4 other books, African Birds (the present guide is far from complete) African Wildflowers, Butterflies and Shells. The first day he took us to his home where we had tea, typically British, and he showed us many of the plates for his new books. I don't see why he doesn't complete one before starting on another. Three or 4 times a year he takes small groups out on birding trips. The wealth of bird life in East Africa is astounding, over 1,132 species in Kenya (U. S. has a few over 700) and John knows them all including their latin names and all the wildflowers and latin names, so we were in good hands. But John, who is very hard to hear because of a soft voice, is domineering, impatient.

Of the 25 days we spent in Africa 14 of them were in camps, 4 different ones. This is surely the way to see Africa. We slept in tents which zipped and were zipped to a tent floor so snakes, etc. couldn't get in. Of course large predators could have torn the tents down. Three of the camps were "Root and Leakey" camps, our tour agency, and had been set up just for us. At these camps there were two tent toilets and tent showers. It took 8 black men to set up the camps, cook the food, do our laundry and wait on the 6 of us so you can hardly say we were roughing it, and accounts for the fact that it costs us about 80 dollars a day per person (more than we paid at the swankiest resort in Hawaii) and also we used a lot of gasoline. The food was excellent, a 3 or 4 course dinner served in a dining tent. Dinner was at 8 or 8:30 so I showered and got into pajamas after coming in from bird trip to have dinner. All the food was cooked outdoors, the cook had a 6 ft. long bank of hot ashes and set his pot on top, even baked fresh bread- The day we left each camp the men began to take it all down to reassemble at next camp—working like a circus crew. All night long a lantern is kept lit in front of each tent and in front of the toilets. At 2 of the camps, Samburu and Paradise, there was a good deal of fresh elephant manure lying around but they did not come into camp while we were there. However once a lion did, roared every ten minutes from 5 to 6 A.M. A leopard snarled and coughed at 2 A.M. perhaps had smelled a freshly skinned out fat-tailed lamb we had bought for the men. They consider it quite a delicacy and frightened the leopard away by beating on pans. After that John had 2 campfires built at night to keep it away. I noticed they were both out however when I went out to the toilet in the night. The baboons often made a great racket during the night. John says the leopard walks up and down under the trees they are in to excite them till one falls out. We were not supposed to leave the camp but John took us out one night with flashlights to look for owls with the warning that if we saw a lion **not** to run.

Do you remember Martin and Osa Johnson who took the first movies of African animals and went around the country giving lectures in the 1920's? Well our Paradise Camp was at the site of the Martin Johnson camp, down in the bottom of a crater with a small round lake filled with ducks. Osa wrote a book "Four Years in Paradise". It was not our favorite camp as the sun didn't get to the bottom of the crater till 10 A.M. to lift the mist. There were Great Kudu here though, a rare African antelope, plus lots of elephants and Charlie saw a Caracal. Our next camp on an island in Lake Baringo was truly a paradise. The lake, however, is muddy due they said to too many goats grazing near the water. Many of the rivers are muddy too due to poor agricultural practices. At our last camp at Saiwa Swamp, a high elevation, I nearly froze at night. I put on all my clothes on top of my pajamas, even put on my safari hat tied on with scarf. The second night they gave us extra blankets but I think the cold came through the mattress from underneath. The cot sagged too much for me but I fixed that by putting my pillow under the mattress in the low spot.

I have a new camera with a 300 mm lens (I was told I could not handle a bigger lens) and I wanted to take bird pictures to show our bird



club and my garden clubs. Even with a big lens one has to be within 20 ft. of a small bird to get any kind of a picture. This is very difficult to do without a blind. I am slow at focusing and the other members of the tour, especially John, are impatient. Ahead of time we thought we would all be in one bus but instead we had 2 Land Rovers with a black driver and 3 others in each. Many of my pictures were taken out of the car window as it was not safe to get out. Never having held a camera before I am stupid about it (I'm sure now Grandma Moses must have painted as a child in spite of saying she started at 80). Hopefully I have a few animal pictures—I could hardly miss on the elephants—and maybe a few flower pictures as we stopped frequently so John could pick, picture and press a rare wild plant for his new book. Charlie did no better with his hobby. We thought it would be fun to record the animal noises at night so before we left home he exchanged his old recorder for a new supposedly better but small one. Well it records human voices okay but so far nothing else although we witnessed a quarrel between elephant and buffalo with much trumpeting and mooing and have heard lions roaring and baboons barking.

I thought I would be able to get pictures of the people at least. There are 12 different tribes in Kenya, but they don't want their pictures taken, nor their livestock. Apparently think you will use it for witch craft, so our black drivers wouldn't stop to let me take pictures of people. I notice our drivers seemed fearful of some of the northern tribes.

Our group saw 576 species of birds—half of them had no picture in the guide. Perhaps the most beautiful big birds are the Crowned Cranes and the Flamingos. The most interesting family is the Hornbills—the male plasters the female into the nest hole, feeding her through a tiny slit. I guess if he should die she can whittle herself out. The weaver birds, many golden, are interesting with a dozen or more straw nests in one tree, and the Starlings are simply beautiful, particularly the Golden-breasted Starling. If the U. S. has to have a Starling and a Weaver bird (our House Sparrow) its too bad we couldn't have better looking ones. Neither our Starling or House Sparrow lives in Africa. To see this many birds, it was as if John's reputation as a tour guide depended on a great number, we had to spend too much time near water and agricultural land. I would rather have seen more mammals. The best sight was 3 baby elephants and one teenager playing in a river, ducking under and rolling around like little boys. Their mothers stood near the shore eating. The smallest baby gets out on the bank and lies flat for 3 minutes like a tired kid and then jumps back in. Finally the mothers push them all out on the shore and they move off. Charlie wants me to tell you about the baby elephant stuck in the mud. Its mother trumpets and 6 other elephants appear. They start by stamping the mud all around the baby and then with many trunks lift it up out of the mud.

Driving for hours every day in our Land Rovers was not easy even on primary roads and we were usually on secondary roads which felt like washboards, or worse roads. The hardest trips were up to Lake Rudolph and back as the roads were of big lava stone. Many people are walking on them but we only met one car both days which shows how few cars

these people have. This part of Kenya is filled with old worn out volcanoes. As there is so little rain, 3 or 4 inches a year the lava stones don't break apart and the land is stark with practically nothing growing. The people are not starving here but are short of water. Two women held out bowls and our drivers stopped and gave them some of our water. We often took a picnic lunch with us and the drivers would pour water over our hands to wash before lunch. One day when a group of Boran, Nilotic people (at one time Lake Rudolph was connected to the Nile) who have thin noses and lips, handsome, gathered around us, John told drivers not to pour water over our hands as these people would be shocked by this waste of water. On our trip back to Marsabit we picked up a very sick woman and her father and took her to the hospital. I hope she didn't have anything contagious; may it was malaria. We have had trouble with woodticks, I found some well entrenched under my knees and between toes and sand fleas, and we took malaria pills every week. Had to have cholera shots but our yellow fever and small pox of 2 years ago didn't have to be renewed. Lots of camels around Lake Rudolph but again I didn't dare take a picture if anyone was looking. We stayed at the Oasis Lodge, recently rebuilt because 5 years ago it was burned down and the owners and all tourists massacred by Shifta. The oasis is caused by springs and the water table coming within 4 feet of surface. Daum palms were the only trees because they can withstand the strong wind. If it wasn't for this constant wind it would be very hot here. Lake Rudolph is 185 miles long and 35 miles wide, "discovered" in 1888 by Austrian explorer and named after the neurotic crown prince, son of Frans Joseph. (He committed suicide.) The only other tourists at the Oasis Lodge were fishing groups who had flown from Italy and Germany. The wind was so strong they were not able to go out in boats. What they were after were 100 to 200 pound Nile Perch. John tells us too late not to let natives look through our binoculars as many have an eye disease we might catch. To show how bad the roads were we went only 27 miles in 3½ hours. There are lots of birds on the lake and crocodiles; in fact all the lake and river had them, but they are not very interesting as they just lie on the shore or submerged in the water. Charlie and I both suffered from diarrhea, Charlie more violent but mine more prolonged. Water was carried for the whole trip from Nairobi.

As this was principally a birding trip I feel I should tell you about a few more. The White-bellied Go Away Bird, 16 inches, call sounds like "Go Away", is unpopular with hunters as it warns game of man's approach. The Widow Birds, the body of male only 6 inches but a 24 inch tail which it sheds after nesting. Because of tail they can't fly very high, merely fluttering up out of marsh as if to show tail. Male is polygamous. There are many beautiful Sunbirds, iridescent like Hummingbirds and feeding on nectar from flowers.

What did I bring home from Africa—a few more hand carved animals. Some flamingo and guinea fowl feathers (may have trouble getting them through U. S. customs). An Elmololo fishbone necklace I bought from a little boy. The Elmololo are a vanishing tribe, only about 280 left, most of whom are now living on an island in Lake Rudolph, living en-

tirely on fish as nothing grows on the island. Evidently something is lacking in the all fish diet as the boys had poor teeth, the only poor teeth I saw in Black Africa. Two vertabrae from the Rudolph Nile perch to show Mark how big they are. A crystal stone I bought from a Boran who through pantomime showed that he slept 4 nights, dug into ground with difficulty had pains in his stomach and tongue hanging out from thirst in order to get stones. Charlie had a fit about stone because of its weight in the suitcase. T-shirts with animal pictures for the grandchildren. Before we left for home John gave me quite a few slides of birds that had been given to him so I guess I have to forgive him for not letting me take my own, and Charlie bought a recording of wildlife sounds.

In the remaining space I would like to tell a little about the political situation in Kenya. There are only ten thousand non-Blacks living there now. As you know Uganda forced the Indians and Europeans to leave. Kenya has not forced them but has accomplished the same thing by denying them work permits which have to be renewed every 3 years. We heard tale after tale about whites not getting work permits—even a Swiss doctor who had allowed himself to be bitten by tsetse fly for science. In all these cases the whites had retained British, Swiss or Norwegian citizenship rather than becoming citizens of Kenya. Kenya has been independent for 10 years now and is well run by President Kenyatta (not his real name, its as if George Washington had named himself Mr. U. S. A.) who is 82 and there is worry about what will happen after he dies. John repeatedly pointed out good farms which will be ruined when turned over to Blacks, but naturally John is a British Imperialist. The Blacks are making an effort to qualify themselves for the jobs the whites have. Our drivers had binoculars and bird guides and paid attention when John pointed out the birds. Perhaps they hope someday to be able to take tours on their own. The public schools are not free, teach both English and Swahili. The families are too large. Our driver had 9 children by one wife and our waiter 9 children by 2 wives. He wants Charlie to help get a college scholarship for one of them. Over 60 percent of the people are under 20 years of age. The tourist means many jobs and therefore they are trying to save the birds and mammals as they know that is what the tourist comes to see. But if the population continues to grow there won't be enough room.

The trip was a great experience but harder than our first trip because of the rugged hours of driving—don't think I can take another one.

Mary and Charlie Nelson

## **One Day In the Life of a Young Barred Owl**

**By KEITH JANICK**

A young barred owl was turned over to me on July 23. The fluffy-headed owlet had been taken from a boy who claimed that the owl had attacked him. The owl was so young that it could not fly far and it must have left the nest only a few days before. It certainly wasn't capable of attacking anyone.

The first step to becoming a foster parent was to get him used to people. I did this by walking toward him slowly, speaking softly, and occasionally scratching the top of his head, which he did like very much.

After getting him thoroughly used to people, the next step was to let him know that my whistle meant food. I whistled each time that he swallowed a succulent morsel of raw chicken and feathers. Finally he learned to come to my whistle. Gradually he came from farther and farther away on a beautiful sun porch overlooking a bright and colorful wildflower garden.

Soon it was time for the big day . . . the day when he was put outside completely free and expected to come to the whistle for food. How exciting and frightening it was! He was free, able to go anywhere he wanted to, and when I whistled he came to me!

Now I let him stay out in the daytime, but called him about four times a day so he would stay around. Each night before I went to bed, I gave him another handout and brought him onto the porch. If he left, not having had hunting experience, he would surely die.

After a while he learned to come to a dinner bell other than the whistle. He learned that the slamming of the porch door meant that someone was coming out to feed him and he'd be right there expecting a treat. He also learned to distinguish between the slamming of the porch door near which he was fed and the back door where I never fed him.

At the same time he were helping some orphaned Harriers that were learning to fend for themselves in the wild. They were fed near the back door. They responded to the slamming of the back door only. We were hoping to keep the owl and the Harriers apart so that they wouldn't tangle with each other. But they did fight quite often anyway. At feeding time they all came to my whistle and ended up in screeching aerial dispute. Since all three were about the same size no one got hurt.

For centuries owls have been known to be nocturnal, so one would think that they'd sleep by day. I decided to watch the Barred Owl for one whole day. Barred owls may get much less sleep than one would suspect. I watched him for 14 hours and 39 minutes: from daybreak until dark. He slept only 23% of the time.

He slept on and off from 7:10 in the morning till 7:36 at night. During this time he was awake for considerable periods only between 8:07 and 10:10 in the morning and between 5:34 and 7:16 in the afternoon.

When falling asleep he usually looked straight ahead as if he were in a daze, then shut his eyes halfway, tilted his head slightly, and closed his eyes completely. If nothing disturbed him, he fell asleep.

For about 11% of the day he sat dozing with his eyes about half open, not making a sound.

During the time I spent with the owl I discovered that the owl and the Harriers fought during overlap periods, namely when the diurnal Harriers and the nocturnal owl were both active. They fought between 6:24 and 8:19 in the morning and at 6:24 in the evening until 6:51. They fought much harder in the morning than in the evening. A Harrier often

started the fight by diving at the owl. Whereupon the owl flipped into the air, struck wildly with his powerful feet, each equipped with four needle-sharp talons, but did no harm.

Early in the morning, before it was light enough to see well, the owl stooped twice at a squirrel moving from branch to branch in the tree tops. During the day he occasionally darted at insects and a couple of small birds. His list of kills for the day consisted of one large ant or beetle.

Owls are sensitive to noises, but because this owl was tame, people and their sounds did not bother him, although they could disturb his sleep. The only sound that did frighten him was the honk of the horn of a semi truck on a nearby road.

I was surprised that the owl did not creep away and hide in a hole all day. He actually spent 63% of the day in open country—a garden with scattered trees, for the most part killed by the Dutch elm disease. He may have spent more time in the open because he was a tame bird.

One of his favorite pastimes was “killing” things of little nutritional value such as sticks, bark, grass and a plastic bag.

The owl often sat sunning, looking quietly up into the sky with his eyes closed, feeling the gentle warmth of the sun without hurting his eyes.

It rained several times during the day. Sometimes he'd open his wings and shake himself or he might sleep through the rain as though it wasn't there.

It is usually squirrels, mice or deer that would have a chance to watch a barred owl all day long. A boy seldom has an opportunity like this.

12009 W. Dearborn Avenue  
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## PURPLE GALLINULE

The Purple Gallinule has been recorded three times in the state of Michigan: May 10, 1964, female, found dead at Grand Marais, Alger County, (E. Hermanson and R. Sylvester); May 29, 1965, female, found dead in Flint Township, Genesee County by Karl Overman; May 2, 1969, alive, in Clinton County by G. Wallace and others.

Another has now been identified at the Clarence Peterson farm, 2.6 miles from the Aurora bridge, on the Fisher Lake Road, in Wisconsin, which is territory included in the annual Christmas Count by the Northland Chapter, Michigan Audubon Society.

On Wednesday, May 2, 1973, about 8:00 p.m. we received a phone call from Mrs. Clarence Peterson, who said they had an unusual bird and wondered if we could help identify it.

In the basement of the home were Mr. and Mrs. Peterson, Mr. and Mrs. Arnold Pearson, and their son, Gary, all grouped around a large wire cage about 30" by 40" by 24" high, in which was a live PURPLE GALLINULE. Gary had been catching minnows in the Peterson farm pond and came excitedly to the house to tell them about the bird by the pond. They donned waders and followed him to the pond, about 300' away. The bird was motionless but appeared to be eating pond weeds. The boy walked out and caught the bird, which remained calm until they reached the house, when it attempted to peck Gary on the arm.

None of us recognized the bird at first but I thought it must be from the rail family so I turned to pages 102-3 in "Birds of North America". I started to write down the descriptive coloring but stopped when I turned to pages 104-5. There, big as life, was the bird we were looking for; 10½" long, it had the distinctive white patch at the top of the forehead, dark purple head, and all of the underparts (except by the tail) were bluish-purple. We also checked the picture of the purple gallinule on Plate #22 of "A Field Guide to the Bird" by Roger Tory Peterson to add to our identification.

While we were there the bird ate three minnows, killing the minnows by hitting the head first, then eating the rest of the body. Mrs. Peterson planned on releasing the bird as soon as the weather warmed up in a couple of days. On the way home from Peterson's I mentioned that we ought to go back and try to take a picture of the bird with our ordinary camera. We didn't go back but I certainly wish we had.

On May 3, while Mrs. Peterson was doing volunteer work at the V.A. Hospital the bird died. She put it in a plastic bag in the deep freezer.

On May 5 Mr. Duane Barnard visited the farm and identified the bird as a purple gallinule. Mr. Barnard has a BS degree in "Wildlife Management and Biology" from Michigan State University. He served 7 years as a U. S. Park Ranger in North Carolina and Arkansas, where he observed the purple gallinule in their natural habitat. He is a licensed taxidermist in Wisconsin.

Gary Pearson, who found the bird, is studying taxidermy and received permission to preserve the purple gallinule. He has done some preliminary work on it and is waiting to get some formaldehyde to preserve the legs and wings. When it is complete we hope to get some colored slides of it for the record.

Frank Kangas, president  
Northland Chapter, Michigan Audubon Society  
804 Hamilton Ave., Kingsford, Mich. 49801

## **Additions and Deletions To Extreme Arrival and Departure Dates, Vol. XXXii, No. 3**

1. Bonaparte's Gull, p. 106, under Spring arrival column delete Mar. 19, 1949, Helmut Mueller and insert Mar. 3, 1974, Rockne Knuth.
2. Black-headed Grosbeak, p. 131, under Winter status insert delete 2 records and insert 3 records. Under exceptional dates column, add Mar. 23-31, 1974, Martin Staab.



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