BROWN-HEADED COWBIRD PARASITISM ON SPOTTED SANDPIPER AND WILSON'S PHALAROPE

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The Brown-headed Cowbird (Molothrus ater) is notorious for its habit of laying eggs in other birds' nests. Normally the eggs are laid in nests of small passerine birds, Yellow Warblers and Clay-colored Sparrows particularly being the unfortunate hosts in Manitoba. In recent years, however, cowbirds have been found to be parasitizing nests of species which they normally never parasitize. On June 15, 1965, Martin McNicholl found a cowbird egg in the nest of a Mourning Dove in Brookside Cemetery, Winnipeg, Manitoba (McNicholl, 1968). On June 15, 1967, one-half mile east of the town of Oak Lake, Manitoba, I located a nest of a Common Crow and this nest contained one cowbird egg Hatch, 1967). On June 19, 1968, the nest of a Slate-colored Junco was found with an old Barn Swallow nest under the eave of the museum building at Wasagaming, Riding Mountain National Park (Hatch, 1968). The nest contained only one young—a Brown-headed Cowbird — which was being faithfully fed by a pair of juncos. This nestling was successfully fledged. Three nests actively being used by Barn Swallows on this same building were also examined June 19, 1968, and two were found to contain cowbird eggs.

This past summer I was surprised to discover a cowbird egg in the nest f two additional species. These were Wilson's Phalarope (Steganopus triolor) and a Spotted Sandpiper (Actitis macularis). The young of both these pecies are precocial and as such they eave the nest the day they are hatched. Consequently, even if the cowbird egg lid hatch in either species' nest, the young would surely perish as it would e left alone in the nest and die of tarvation or exposure. Both species nust be considered "accidental hosts" nd in all probability the cowbird 'dumped" her egg because she could

not locate the nest of a suitable host species.

The Wilson's Phalarope nest was located at Watchorn Bay on Lake Manitoba approximately 10 miles west of the village of Moosehorn, Manitoba. It was a depression in damp, alkaline ground 32 yards from the edge of the water. It was lined with fine sedges of the same Carex sp. that surrounded the nest and which were six inches high at the time of my visit, June 15, 1970. The nest contained the normal clutch of four phalarope eggs all pointed with the small end at the centre of the nest, plus the cowbird egg. The cowbird egg was in the nest but rested on the outside edge of these four eggs. Unfortunately I was unable to return to the Moosehorn area again within the next couple of weeks, so I was unable to determine what happened to the cowbird egg or the nest.

As a point of interest, one wonders what attracted the cowbird into this particular locale in its attempt to find the nest of a host species. The nest was at least 200 yards from the nearest trees or shrubs. Cowbirds do lay eggs in Red-winged Blackbird nests which are built in trees, shrubs, cattail or bulrush, but in this case even the nearest cattail and bulrush were 150 yards distant.

The Spotted Sandpiper nest was located on an island in Lake Manitoba. The nest was found on June 26, 1970, and observed by Gene Collins, Brian Gillespie and me. The nest was a depression lined with fine grasses located in sparse vegetation, consisting of 10inch high sedges and 18-inch high goldenrod. Willow, Manitoba maple and elm were all within 40 yards of the nest. The nest possessed the usual four sandpiper eggs, plus the cowbird egg. In this case the arrangement was entirely different from the phalarope nest. Here the cowbird egg was in the centre of the nest and the other four

eggs evenly spaced around it and all pointing inward, suggesting that the egg had been accepted by its host. The three of us visited the nest site on July 8, 1970, and found that the nest had been destroyed. Lake Manitoba was so high in May and June, 1970, that hundreds of nests were washed away whenever strong winds occurred, as these produced wind-tides which inundated all low land both on the islands and the mainland.

Bent (1965) reports that Friedmann (1929, 1934, 1938, 1943, 1949) listed 149 species and subspecies victimized by the eastern cowbird. Neither in the earlier papers nor in Friedman's recent survey (1963) was the Spotted Sandpiper included. However, Friedmann does give the following account for the Wilson's Phalarope:

"At Bear River Refuge, Utah, on June 3, 1938, Williams and Trowbridge (1939, p. 77) found two nests of this bird parasitized by the northwestern race of the Brown-headed Cowbird. The nests were about 25 yards apart and were fairly well concealed in damp salt-grass on a small artificial island in the lower marshes. Each contained four phalarope and two cowbird eggs. Since these instances seemed from available information to constitute a new host record, subsequent visits to the nests were made to learn the ultimate fate of the eggs. On June 21, it was found all the phalarope's eggs in one nest had hatched and two cowbird's

eggs were left. These were later flooded. In the second nest, on June 28, three phalarope eggs were found hatched. The remaining phalarope's eggs were pipped but had been destroyed by flooding along with the cowbird's eggs. One of the cowbird's eggs in the first nest was evidently infertile, but the other was advanced in development."

Friedmann (1963) gives one record for the Upland Plover and includes the Killdeer with considerable doubt. Mr. Harold Mossop in "Chickadee Notes" however, states "We once found a cowbird egg resting snugly with the usual foursome of Killdeer's very much larger eggs." These are the only two other species found in Manitoba, which have precocial young for which there are records known to me of cowbird parasitism other than the two I found this year.

LITERATURE CITED

- Bent, A. C. 1958 (Dover Edition 1965). Life historics of North American blackbirds, orioles, tanagers and allies. U.S. Nat. Mus. Bull. 2011.
- Friedmann, H. C. 1963. Host relations of the parasitic cowbird. U.S. Nat. Mus. Bull. 233.
- Hatch, D. R. M. 1967. Cowbird egg in crow rert. Blue Jay 25:189.
- Hatch, D. R. M .1968. Slate-colored junco nesting in barn swallow nest; brown-head-d cowbird parasitism on junco and barn swallow. Blue Jay 26:190.
- McNicholl, Martin. 1968. Cowbird egg in mourning dove nest. Blue Jay 26:22.
- Mossop, Harold. 1963. Chickadee Notes No. 452. Winnipeg Free Press, Sept. 14, 1963.



Photo by R. A. Mitchell, The Pas, Manitoba

Spruce Grouse