Bulletin of the

OKLAHOMA ORNITHOLOGICAL SOCIETY

Vol. XX

June, 1987

No. 2





YELLOW-HEADED BLACKBIRD HABITAT AND YOUNG

Both photos taken by Jack D. Tyler on 14 June 1986 at Optima Lake, Texas County, Oklahoma.

A NESTING YELLOW-HEADED BLACKBIRD COLONY IN TEXAS COUNTY, OKLAHOMA

BY JOHN S. SHACKFORD AND JACK D. TYLER

Between 1900 and 1930 on 29 May 1986, Shackford was taking inventory of the birdlife of Optima Lake in Texas County, near the center of the Oklahoma Panhandle, when he noticed eight or ten adult Yellow-headed Blackbirds (Xanthocephalus xanthocephalus) of both sexes at an extensive marsh of cattails (Typha angustifolia) bordering the northwest shore of the lake (Fig. 1). The males were singing vigorously, particularly from scattered dead salt cedar (Tamarix gallica) trees projecting above the tall cattails. They appeared to be protecting individual territories. The date was late for migration, even though this western species has been recorded in the Panhandle at Webb's Lake 7 miles east of Hardesty, Texas County, as late as 29 May when W. A. Carter, Larry A. Pullium, Danny L. Jobe and Gerald P. Hutchinson saw many of them in 1969 (Carter field notes). Large flocks containing both sexes are sometimes encountered. For instance, the junior author and Anne Powell counted over 420 at the Boise City sewage ponds on 13 May 1973 (Tyler field notes).

Suspecting that this was a nesting colony, Shackford waded out into the marsh to investigate. When he squeaked near the males, they were noticeably itated, scolding raucously as they hovered overhead. The few Red-winged

Blackbirds (Agelaius phoeniceus) within earshot, however, were unperturbed. Before long he discovered, interwoven among several cattail stalks about $3\frac{1}{2}$ feet above the water, a nest that held three grayish-olive eggs, spotted and splotched with light brown. It was composed largely of dead blades of cattail or bulrush (Scirpus sp.) and a few black feathers were in the lining. The second nest, found shortly thereafter, contained four eggs and was about 3 feet high. The water here was only about a foot deep.

Shackford contacted Tyler that evening, who joined him at the lake on 13 June. The next morning, between 0745 and 0830, they surveyed the entire marsh through a spotting scope from the dam, which lay to the southeast. In that section of cattails where Shackford had found nests, three or four male Yellow-heads were spotted, another was about 300 yards south of this main colony, and yet another near the dam. One male even chased a Great Blue Heron (Ardea herodias) briefly as it flew over his territory. We watched one of the females fly from the colony all the way across the lake to the dam — a distance of approximately ¾ mile — where she foraged in the grass. After catching food, she made her way back across the open expanse of water. This procedure was repeated four times, and twice a large insect was seen in her bill while she was airborne. Fautin (1940) commented that most of the Yellowhead's food is obtained outside the nesting area.

At 0945, the authors walked around the northeast tip of the lake to the cattail marsh. The temperature had risen by this time to about 90°F on a clear, bright day of virtual calm. Except where a few room-sized openings were interspersed, the cattails grew so closely together as to be nearly impenetrable. The Yellow-heads began to utter loud alarm notes as the observers neared their territories. Although the two nests found by Shackford in May were not relocated, another was soon discovered. It was neatly interwoven to about 25 cattail leaf-stalks 37 inches above the water and about 10 feet in from the closest opening. The cattails, typical of others in the marsh, rose 70 inches above the water, which was 15 inches deep. In the nest were two hatchlings and two eggs.

Fautin (1941b) reported that clutch size in Utah ranged from two to five, with four the commonest number. The nest itself measured $3\frac{1}{2}$ to 4 inches outside height, the bowl 3 inches in both depth and diameter. Our squeaking attracted about 15 birds, with neither sex preponderant.

The second nest held two nestlings almost ready to leave; a larger fledgling was clinging to the cattails two feet above them. This nest was 22 inches from the water in dense cattails about 20 feet from the nearest clearing. When the young birds gaped for food, their orange-red mouth linings were conspicuous. Richter (1984) reported that this species shows a high level of hatching asynchrony, so that few nests ever contain more than two hatchlings in one day. This promotes brood reduction of younger nestlings under conditions of food stress. Young Yellow-heads on average leave the nest at 11 days of age (Fautin 1941a), so the authors estimated this older chick to have been about 10 to 12 days old. It was collected and later prepared as a voucher specimen by Tyler (male, CUMZ 981). It measured as follows: total length 131, wing 79, tail 18, tarsus 41 mm, and weight 50 g. The exact collection site was 3 miles east and 4½ north of Hardesty, Oklahoma.

Three downy young, estimated to be from three to five days old, were resting quietly in the third nest, which hung 26 inches over the water, bound to cattails

eight feet in from one of the large openings. This nest, like the others, was constructed of dead grasses with a few cattail leaves intermingled.

A short while later, another stub-tailed, recently fledged male chick (Fig. 2), was found clinging to cattails some distance from any known nest, but its nest could not be located. It was similar in size to the young male taken from the second nest. This fledgling, as well as all eggs and young of the three nests described above, were photographed and the slides deposited at Cameron University. In addition, two other short-tailed, brownish-gray fledglings were seen flying about in the colony. Because one or two adult male Yellow-headed Blackbirds and six or eight females were observed carrying food, it was felt that there were other nests nearby. However, it would have been virtually impossible to completely search the big marsh. In fact, without the solicitous behavior of the parent birds, the authors would probably not have discovered a single nest.

Fautin (1940) also found that nests in Utah were inevitably suspended above water in a territory occupied by a male and one to five females. Accordingly, the authors' estimate of a total of 25 adult Yellow-heads at the lake was felt to be conservative, for a few other males and females were noticed in contiguous marshes.

Backdating from 14 June, and assuming the average age at fledging to be 11 days, the newly fledged young Yellow-heads in this colony would have hatched on or about 3 June from eggs that had been incubated an average of 12 days (Fautin 1941a) after having been laid about 22 May. Since fledglings do not learn to fly until attaining an age of approximately 21 days (Fautin 1941b), the flying young seen in the colony would have been at least 10 days older. The eggs from which they hatched, therefore, would have been laid on or about 12 May. Allowing a few days for pairing and nest construction, breeding at Optima lake probably began in 1986 around the first week of May.

Optima Lake was impounded in 1978, and has never been deeper than 83 feet from the top of the floodgates; at the time of these observations, it held only about 400 (7%) of the potential 5340 surface-acres of water at the top of the conservation pool (fide, Ben Burdo, lake ranger, and Corps of Engineers data). It is possible that the Yellow-heads had bred at Optima Lake previously. Certainly the habitat had been available for several years.

Xanthocephalus is not an uncommon nester in nearby Colorado (Bailey and Niedrach 1965), the northern half of New Mexico (Hubbard 1978) and in western Kansas (Johnston 1964). For Texas, there is one old nesting record: between 18 and 30 May 1876, C. A. H. McCauley found a nest in Armstrong County in the Panhandle (Oberholser 1974). There are also a few recent breeding records, all in the Panhandle: for Castro County in 1978 (1978, Amer. Birds 32:1181) and 1982 (1982, Amer. Birds 36:994); nesting was also reported in Castro, Parmer and Swisher counties by Fischer, et al. (1982), and in Bailey County in 1986 (1986, Amer. Birds 40:1224).

These findings constitute the first breeding record in Oklahoma since 1914 for Yellow-headed Blackbirds. The only other known record was in Cimarron County, near Kenton: R. Crompton Tate (1923) collected a nest with three eggs at a slough on the C. F. Rowan ranch on 19 June 1914. The "young in juvenal plumage" seen in a small flock with females on 25 May 1905, near Minco in Grady County, central Oklahoma (Wetmore 1918), might have been migrating subadult males not fledged in Oklahoma in the opinion of G. M. Sutton (1967),

since the spring passage of fully adult males is over by mid-May. There are mid-summer records for several other (mostly western) counties, but the majority probably represent southbound migrants (Sutton 1967). Sizable cattail marshes in the Panhandle and other areas of western Oklahoma should be watched closely for nesting activity in the future.

LITERATURE CITED

- Bailey, A. M., and R. J. Niedrach. 1965. Birds of Colorado. Vol. 2. Denver Mus. Nat. Hist., p. 715.
- Fautin, R. W. 1940. The establishment and maintenance of territories by the Yellow-headed Blackbird in Utah. Gr. Basin Natr. 1(2):75-91.
- Fautin, R. W. 1941a. Development of nestling Yellow-headed Blackbirds. Auk 58:215-232.
- Fautin, R. W., 1941b. Incubation studies of the Yellow-headed Blackbird. Wilson Bull. 53:107-122.
- Fischer, D. M., M. D. Schibler, R. J. Whyte, and E. G. Bolen. 1982. Checklist of birds from the playa lakes of the southern Texas Panhandle. Bull. Texas Orn. Soc. 15 (1 & 2):1-7.
- Hubbard, J. P. 1978. Revised check-list of the birds of New Mexico. New Mexico. Orn. Soc. Publ. No. 6, p. 81.
- Johnston, R. F. 1964. The breeding birds of Kansas. Univ. Kansas Publ. Mus. Nat. Hist. 12(14):642-643, Lawrence.
- Oberholser, H. C. 1974. The bird life of Texas. Vol. 2. Univ. Texas Press, Austin, p. 808.
- Richter, W. 1984. Nestling survival and growth in the Yellow-headed Blackbird, Xanthocephalus xanthocephalus. Ecol. 65(2):597-608.
- Sutton, G. M. 1967. Oklahoma birds. Univ. Oklahoma Press, Norman, p. 541.
 Tate, R. C. 1923. Some birds of the Oklahoma Panhandle. Proc. Oklahoma
 Acad. Sci. 3:41-51.
- Wetmore, A. 1918. Birds observed near Minco, central Oklahoma. Wilson Bull. 30:2-10, 56-61.

ROUTE 1, BOX 125, OKLAHOMA CITY, OKLAHOMA 73111, AND DEPARTMENT OF BIOLOGY, CAMERON UNI-VERSITY, LAWTON, OKLAHOMA 73505, 19 FEBRUARY 1987.

GENERAL NOTES

Trumpeter Swans in Greer County, southwestern Oklahoma.—On 8 February 1986 at approximately 0915, I discovered six swans loitering around a pond 9 miles southwest of Mangum, Oklahoma. Five were immaculate white adults, the sixth a dusky young bird. They were much larger than Canada Geese (Branta canadensis) and I could see that the adults' bills were completely black, lacking the yellow patch at the base typical of most Whistling Swans (Olor cygnus). I was too far away to tell whether there was a pink "grin line" on the bill of any of the adults, but could see that the young swan's bill was black basally, pinkish toward the center, and black at the tip. I suspected that they were Trumpeter Swans (Olor buccinator).

On 24 February I notified Quartz Mountain State Park naturalist Victoria Begin of the swans. She tentatively agreed with my identification after viewing them on 2 March. On 6 March Dr. Jack D. Tyler confirmed our identification