

evidence of the marital instability, if not delinquency, of the house wren. I incline to fear that this unnatural tendency of a semi-domesticated bird is attributable in some measure, to intimate human association, and so the philandering wren does not deprive me of my persistent belief that honest wild birds such as I know are manifest examples of life-long matrimonial fidelity. Mrs. Whittle's pleasing biography of the constant Nuthatches again sustains my faith.

LANCASTER, MASS., SEPT., 1926.

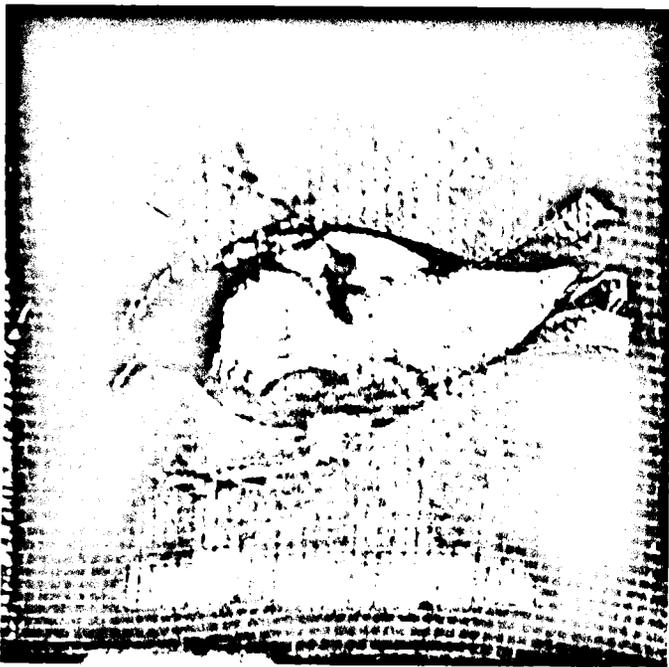
HOME LIFE OF THE BLACK-THROATED BLUE WARBLER

BY KATHERINE C. HARDING

ON June 8, 1926, I found the nest of a Black-throated Blue Warbler (*Dendroica c. caerulescens*) near Lake Asquam, New Hampshire. It contained three eggs and was built twelve inches from the ground, on the edge of a patch of mountain laurel (*Kalmia latifolia*). The nest was placed between the prongs of two dead sticks, which had fallen in a horizontal position and were supported by laurel branches. The inside diameter was two inches, the outside diameter was three inches, and the depth two inches. The outer wall of the nest was built of strips of shredded bark and was ornamented with the rusty wool of the cinnamon fern (*Osmunda cinnamomea*) and a few small strips of birch bark. The lining was made of pine needles, fine black rootlets, and black horsehairs.

The eggs were ivory white with a blotched wreath of sorghum brown (Ridgway) chiefly around the larger ends. On June 9th at 10.30 A. M. the clutch of four eggs was completed, and on June 10th the female was incubating them. At 7 P. M. on June 21st none of the eggs had hatched, but at 10 A. M. on the 22nd one nestling was out, and two more had hatched by 12.10 A. M. The fourth egg was sterile. The period of incubation was thirteen days.

Between 12.10 P. M. and 1.10 P. M. on the 22d the male parent had not appeared at the nest. The female fed the young five times in the first twenty-eight minutes, brooding them between feedings. She then settled herself on the nest, until 12.49, when she fed them again. Between 1.55 P. M. and 3.55 P. M. on the same day the female fed the young



A Male Black-throated Blue Warbler

six times, brooding them between feedings. At 2.31 P. M. the male appeared at the nest and gave the female half a small green caterpillar, eating the rest himself.

The next day he began feeding the young and sometimes fed the female while she brooded them. The insects, which were the regular diet of the nestlings, were too small to identify from my blind.

During the first twenty-four hours the female devoured all the droppings of the young, while under observation, after which both parents shared in carrying them away from the nest.

On June 28th the six-day-old fledglings were banded and showed no fear at being handled. Using the young as decoys, the male and female Black-throated Blue Warblers were both caught in a Chardonneret trap, and I am greatly indebted to Mr. Malcolm Taylor, Jr., for photographing the banded male so successfully (see picture of male in gathering cage p. 66). With the hope of recording a "sight return" next summer, a scarlet band was placed on the male.

NOTES ON PLUMAGE DEVELOPMENT

June 22nd—A newly hatched nestling (male) was about the size of a bumble-bee. His eyes were closed, and damp wisps of natal down were visible on his head and back.

June 24th—When two days old, he was one and a quarter inches long and his eyes were closed. The capital and spinal feather-tracts were covered with natal down.

June 25th—The three-day-old youngster measured one and five eighths inches long and his eyes were still closed. The natal down remained in evidence, while the quill-casings of the primaries and secondaries were strongly ridged, but not separately defined.

June 26th—The four-day-old bird measured one and three quarters inches long, and the eyes were still closed. The natal down was disappearing, and the quill-casings of the primaries and the tips of the secondaries were separately defined. The quill-casings of the caudal tract also were well developed. The first evidence of the appearance of feathers was noticeable in the greenish-blue color of the spinal feather-tract and the upper portion of the ventral tract. The lower portion of the ventral tract was a rich ivory color.

June 28th—The fledgling's eyes were open, and his sense of fear had developed within a period of twenty-four hours.

June 29th—The youngster, now seven days old, was two inches long. The quill-casings were blue-gray and the tiny gray-brown feather-tips of the primaries and secondaries were unfurling. The lower portion of the ventral tracts were sulphur-yellow and the upper parts gray-brown like the wings. The feathers which had appeared in the capital and spinal tracts were dark brown, and the feather tips in the caudal tract were unsheathed.

On June 30th, eight days after hatching, the young left the nest.

ADDITIONAL EXPERIENCES IN BANDING TERNS AT TERN ISLAND, CHATHAM, MASS.

BY CHARLES B. FLOYD

OUR *Bulletin* for October, 1925, published the results of my banding work during a period of six days on a small island of fifty-four acres lying close to the shore off Chatham, Massachusetts. From July 4th to July 18th, 1926, I continued this work for a much longer period than during the previous year. The banding work has been of special interest because opportunity was offered to make a close estimate of the response made by a Tern colony to genuine protection from both man and other enemies. The Common Tern, possibly also the Arctic Tern, on the Massachusetts coast, and, in fact, on all the Atlantic coast, was in 1890 in danger of extermination by wing and tail hunters who sold these parts to the millinery trade. Now all this has been changed. The earliest move to save these birds was in 1886 by a Committee on bird-protection appointed by the American Ornithologists' Union. A more recent organization, The Federation of the Bird Clubs of New England, in 1924 began purchasing islands off our coast on which Terns bred or had once done so, and has presented them to the State of Massachusetts to be used as bird reservations in perpetuity. The Federation for the present supplying warden service. The process of purchasing them was to obtain options and then make direct appeals to public-spirited citizens for funds to buy them, a method which has been signally successful. The effect of the publicity attained has been to encourage direct gifts of several islands and interior tracts to the Federation, which in