For a mile or more we heard the dull booming farewells of the pelicans as they arose in concert, presumably rejoicing at our departure.

During the entire evening, and until darkness settled over the lake, we saw a large number of small flocks of the Wilson Phalarope. In fact, one or two flocks of these birds were always in sight, either swimming in the water or skimming along through the air, occasionally executing that maneuver that resembles the flashing of a scimitar as the whole flock suddenly and in concert changes the course of its flight. The swimming birds were evidently feeding upon refuse floating on the lake, contributed, very probably, largely by Bear River.

We arrived at Egg Island about 3 A. M. after a trip that was for the most part uneventful, so uneventful that practically no headway was made for an hour or so during a calm. Egg Island is a small island about ten rods long and four rods wide, located about a mile and a half west of the north end of Antelope Island. It is simply the eroded remains of a ridge of hills that runs under the water, and is formed by the upturned edges of the very resistant quartzite beds. This island is practically barren of all vegetation. A few gulls were found nesting here, and likewise a few Great Blue Herons. There is nothing to add by way of narrative or description of these birds as they were found on Egg Island, except that the nests of the heron were placed on the ground instead of in bushes as was the case on Hat Island.

The special object of interest and also of our visit to this island was the Double-crested Cormorant (*Phalacrocorax auritus auritus*). Of these there were between five and six hundred individuals on and around the island. The nests of these birds were rather artistic. They are six or seven inches deep and about eighteen inches across, and are composed of sticks of a uniform size carefully woven together and cemented with white excrement resembling lime.

The eggs are a greenish blue in color and vary from three to five in number. The breeding season of this cormorant was the earliest of all the birds that we saw on the trip, and extended over a comparatively long period. This was apparent from the presence of partially completed nests, eggs in all stages of incubation, and young birds fully as large as adults and likely to be able to fly within a short time.

The day, May 17, was very stormy, and in consequence our visit to Egg Island had to be curtailed. In fact, three days were required for the homeward journey; but this is another and very different story.

Pocatello, Idaho, February 10, 1916.

## NESTING OF THE TOLMIE WARBLER IN YOSEMITE VALLEY

## By MARGARET W. WYTHE

N THE summer of 1915, responding to the call of the mountains, I spent a few weeks in Yosemite Valley. Arriving there in the early part of June my visit lasted through a large part of the nesting season in the Valley. Hence one of my chief pastimes became the quest for nesting birds.

It was my good fortune to find sixteen nests between June 12 and July 1.

in the immediate neighborhood of our camp, a little distance above Stoneman Bridge and on the bank of the Merced River. The most interesting and also most accessible of these for close observation proved to be a nest of the Tolmie Warbler (*Oporornis tolmiei*), one of the rarer warblers of the region.

On the morning of June 13, while standing close to a clump of blossoming chokecherry, I was attracted by a slight commotion in the thicket, as some small inhabitant beat a hasty retreat. Peering into the brush I discovered a female Tolmie Warbler making off for the opposite side of the thicket. The sudden movements of the bird so close to me aroused my suspicions as to the possibility of a nest in the immediate vicinity. A brief search disclosed the nest with four eggs directly in front of me, and within a foot of where I was standing.

Immediately after this discovery, procuring a tape I took the following measurements. The top of the nest proved to be nine inches above the ground; its depth on the outside was three and a half inches; its outside diameter was three and a half inches; its inner diameter, two and a half inches; and the depth of the cup, two and one-half inches.

The structure was placed between four stalks of the chokecherry, and was supported below by several short twigs growing from the root stock. The materials were not woven around the four upright stalks, although several grass blades passed behind one of them. Materials of which the nest was composed were fine dried grass blades and stems, and several shreds of bark about three-eighths of an inch wide. These latter were woven into the outer part of the structure, where a single oak leaf also lay embedded, whether purposely or by accident, I cannot say. The lining was of fine grasses and a few black horsehairs. Some loose grass blades arched over the top, attached to the nest a little on one side. Later on the two openings thus made by these arching grasses made a sort of entrance and exit, the bird invariably entering on one side and leaving on the other.

There was nothing about this nest to attract attention even at close range. It appeared to be merely a tangle of dead grasses caught at the base of the chokecherry bush and partly hidden by two dead brakes. In fact, although it was placed within three feet of the most frequented path of our camp, we had been passing back and forth a week before discovering it. There were four eggs in the nest at the date of discovery. They were white, thickly spotted about the larger end with lilac-brown spots, these extending around the sides toward the smaller end; a few pencillings of the same color were also found on the larger end. All the time I was making these observations the female Tolmie was hopping about in a perturbed manner at the farther side of the thicket, from six to ten feet away, at times uttering a single low-pitched tsip, similar to that of warblers in general.

During the following week only casual visits were made to the Tolmie nest, to keep watch for the hatching of the eggs, as I was not sure about the state of incubation when they were discovered. The female alone brooded. During the week my findings concerning the Tolmie Warbler varied. Sometimes I found the parent bird brooding, other times she was not, and again I made my visits only when I saw her away from the nest, so as to observe the conditions therein without fear of causing her to desert it. On the 18th she was found in the surrounding thickets noticeably more than on previous days, and at one time was known to be off the nest for a continuous period of twenty

minutes. On this particular day, too, the male Tolmie Warbler was frequently seen flitting about in the brush in company with the female. On the 19th, however, conditions were changed, the female again keeping close to the nest most of the time.

The following day I made two unsuccessful attempts at photographing the nest and eggs. While getting ready to make one exposure at a distance of six feet, which was as close as my kodak would allow, the Tolmie seemed to be trying to make up her mind to return to the nest, and I waited quietly to see what would happen. She kept hopping about on the ground nearby, eyeing me closely, and finally perched within six inches of her home, but would come no closer while I was in sight. A few days later, after two of the eggs had hatched, another attempt at photography gave better results.

Repeated visits up to June 23, usually made while the female was absent, showed conditions unchanged. On this date, however, I had an idea that the eggs must surely be ready to hatch, so my first thought in the morning was to visit the nest. As I came near the chokecherry patch I discovered the female hopping about in an oak tree nearby. Gently pushing aside an overhanging branch I looked into the nest and found that, as I had hoped, it held two nestlings, with scarcely a trace of down on them. The motion I had caused in pushing aside the obstructing branch had been felt in the nest, and immediately one of the young birds raised its head and instinctively opened wide its mouth to be fed.

Observation made the following morning discovered the parent bird absent, and the third egg hatched. Growth in the first two birds had been quite perceptible. They were, on this day, about two inches in length and about the same in stretch of wings. They were now scantily covered with down, a patch showing on top of the head, a line down the middle of the back, and a tuft on the wings. A noon visit disclosed the mother bird brooding. She eyed me as I crept slowly closer, and did not leave until I was within a foot and a half. A pushing aside of the overhanging branch to see if the fourth egg was hatched, produced the automatic opening of the three hungry mouths.

The next two days' observations were confined to brief inspections on the morning of June 25 and on the evening of June 26. The two visits showed no marked change in conditions, but brought me to the conclusion that the fourth egg was infertile.

On June 27 I spent an hour during the morning timing the feeding of the three young birds, from a point about twelve feet distant. I found that the female warbler came with food at intervals of from three to five minutes throughout the hour. During this period the male bird came to the nest only once. My place of observation was too far away to warrant any statement concerning the kind of food brought to the young, other than that it consisted of insects.

The condition of the young birds on June 27, the fourth day after the hatching of the first two (the development being practically the same in all three) was as follows. Juvenal feathers had appeared over most of the head, down the center of the back, and on the wings. The eyes of one bird were open. On the following day the eyes of the second bird were open. Disturbance of the branches above the nest produced the usual effect of opened mouths. On this day the male bird was noted, for the second time, bearing

food to the young. On this trip the bird uttered a single *tsip*, this being the only time I heard either parent utter a note in going to or leaving the nest while feeding the young.

June 29 I inspected the nest once during the afternoon. All three young were sleeping, facing in the same direction. Touching the branches did not cause the birds to open their mouths as they had previously done. They merely opened their eyes, now recognizing, I suppose, that this movement was not the same as that produced by the approach of the parent birds with food. Failing to get the birds to open their mouths by this method, I endeavored to imitate the *tsip* of the adult warblers. Two of the young immediately responded by throwing back their heads and gaping to be fed.

The sixth day showed juvenal feathers appearing on the lateral tracts, and tail feathers just beginning to grow out. On the seventh day, June 30, the wing feathers had broken through the sheaths for about one-half an inch. The birds' heads were well covered with feathers, but the sheaths still adhered at the bases. The contour feathers were in a similar condition. The tail feathers did not show any further development.

As the young Tolmies grew, the mother showed increasing uneasiness at the presence of any one near the nest. Until this day she had hopped about in the brush just out of sight when disturbed. Now, however, she dropped to the ground within three feet, and tried to distract attention from the young by slowly raising and lowering her wings, and continually calling in an anxious manner. She also showed growing wariness when feeding the nestlings. On previous occasions I had been able to stand within ten feet while she fed the young, but now she would not go near. With me at a distance of fifteen feet even, she would hop uneasily about. The young, possibly reflecting the attitude of the parent bird, or perhaps merely because they were getting older, began to show signs of fear, and "froze" when the nest was approached or the overhanging branches touched. A further sign of development appeared on the seventh day. For the first time the young birds responded to the parent's approach with food, by uttering a faint hissing noise.

Morning inspection on July 1, the eighth day after hatching of the first two eggs, disclosed the contour feathers and wing feathers well out of the sheaths, while most of the down had disappeared. The feathers of the upper surface were gray while those of the under surface were grayish-buff. Increasing anxiety on the part of the mother Tolmie made it wiser to keep out of sight as long as she was in the neighborhood. In the evening the male Tolmie Warbler was seen at the nest for the third time. The few times that I saw him there leads me to the conclusion that the male assists very little in the duties of rearing the family.

July 2, the ninth day after hatching, the little signs of nervousness which had been exhibited by the young the day before now developed into real fear. They actually cowered when the nest was approached, and partly closed their eyes. The mother Tolmie, too, became exceedingly distressed by our presence. She almost crawled about on the ground, with wings partly spread, and uttering a repeated tsip. Early in the afternoon I noted that the wing feathers were entirely fledged on two of the birds, and almost entirely so on the third. The same afternoon, a little later, some one announced that the young Tolmies had left the nest; and both parents were heard calling anxiously and excitedly. Only two of the young were seen in the shrubbery, and a look at the nest dis-

closed the third bird still in it. Desiring to secure a photograph of a young Tolmie Warbler, I hastened for my kodak, and on returning found that the laggard, too, had left the nest. It was found in the grass nearby; but after a short time it fluttered into the bushes where the others had already gone. The noisy demonstration by the parent warblers did not last very long, and after it had subsided nothing more was heard from the Tolmie family except the singing of the male at intervals from the brush around camp.

To sum up the important points I learned in regard to the nesting of this family of Tolmie Warblers: The nest was discovered on June 13, 1915, and at the time of finding contained four, probably fresh, eggs; two eggs were hatched on June 23, eleven days after the discovery of the nest; a third egg hatched on June 24, twelve days after the discovery of the nest; the fourth egg proved infertile; the three young birds left the nest on July 2, nine and eight days, respectively, after hatching.

Oakland, California, February 15, 1916.

## SOME DISTRIBUTIONAL NOTES ON CALIFORNIA BIRDS

## By H. E. WILDER

I T IS to be expected that Grinnell's most welcome Distributional List of the Birds of California will call out numerous records of birds found beyond the limits therein defined. Many of us have withheld notes bearing upon distribution for reasons of diffidence, indifference, or sheer inertia, but most of all for lack of just the knowledge now supplied in the above mentioned publication. Even though such contributions lack elaboration of detail they may still be worth while so far as they go. Several such cases are detailed beyond, as of possible interest in this connection.

Mergus americanus. American Merganser. As there seems to be no record of the nesting of this fish duck in the coast region of northern California, it may be worthy of mention that it occurs at all seasons along the rivers of Humboldt County. The young have often been observed before they were able to fly.

Parabuteo unicinctus harrisi. Harris Hawk. Confirming Mr. Dawson's report of finding this Arizona species common along the Colorado River, I found them in numbers in the river bottom near Palo Verde during the first three days of December, 1902. Like ourselves, they were evidently seeking shelter in the timber from the terrific sandstorm that prevailed, and were sitting all about in the trees. As the wind abated they took wing, and ten to twenty could be counted in the air at a time. Two specimens were taken.

Aquila chrysaetos. Golden Eagle. More common in portions of the humid coast belt north of Marin County than is indicated by the records. It is a source of considerable annoyance on the sheep ranches of Humboldt and Mendocino counties, and I see the birds occasionally within a few miles of the coast.

Aluco pratincola. American Barn Owl. Although not reported heretofore from the coast region north of Marin County, this owl is, nevertheless, rather common in the dairy region of Humboldt County, where moles and gophers for its sustenance abound.

The birds are frequently seen about our home at Carlotta, and when living at Ferndale we observed them about the tower of the town water-tank, where a colony of them lived and made the night hideous with their cries.

Strix occidentalis caurina. Northern Spotted Owl. Rare enough, but hardly limited to the two specimens now in the Museum at Berkeley. On January 11, 1913, I secured a