

2, 5 and 11, 1923; January 7, 1924; November 26 and December 11 and 23, 1924; January 16, 17, 27 and 29, and seven days during February, 1925.

White-winged Crossbill (*Loxia leucoptera*). December 22, 1926, twenty-four seen in mountains near Libby; February 7 and 27, 1927, same locality. December 22, 1927, two seen in mountains near Fortine.

Slate-colored Junco (*Junco hyemalis*). January 23 and February 16, 1921, at Fortine, one bird each time. A bird of this species, in company with Oregon Juncos, visited my feeding table at Libby every day except seven from January 14 to March 20, 1927.

Oregon Junco (*Junco oregonus*). Four to six juncos identified as belonging to this species visited my feeding table at Libby on December 28, 1926, and every day except three from January 14 until April 3, 1927. They were watched through a window at a distance of a few inches, and one was examined in my hands.

Red-breasted Nuthatch (*Sitta canadensis*). At Fortine we found this nuthatch common all during the winter of 1920-21, and fairly common the following winter. A few individuals were observed on November 10, 12 and 27, and December 22, 1927; one was seen January 5, 1928. At Libby, I found the species occurring commonly in the Canadian zone during November and December, 1926; a few were seen on January 10, and February 7 and 27, 1927.—WINTON WEYDEMEYER, *Fortine, Montana, March 15, 1928.*

California Black Rail in Los Angeles County.—On a field trip to the Playa del Rey marsh, February 25 of this year, an adult California Black Rail (*Creciscus jamaicensis coturniculus*) was found impaled on a barb wire fence that crosses the salicornia from the Pacific Electric tracks. The fact that the body was impaled, points to the work of a California Shrike. Due to the mutilated condition of the body, only the feet and a wing were preserved. The measurements of wing and tarsus correspond perfectly with those given in Bailey's "Handbook", while the speckled coloration and size of the wing proved convincing. The record has been verified by Dr. Loye Miller of the University of California at Los Angeles. There appear to be no recent records of the occurrence of this rail in this locality.—JOSEPH EWAN, *Los Angeles, California, March 13, 1928.*

Unusual Singing of the Eastern Chewink.—In THE CONDOR (XXIV, 1922, pp. 193-203) appeared a paper by Richard Hunt entitled "Evidence of Musical Taste in the Brown Towhee." In the same magazine (xxv, 1923, p. 134) further observations along the same line were recorded by the same author in a paper entitled "Another Musical Brown Towhee." Hunt in these articles is speaking of a western species of towhee, *Pipilo crissalis*. He heard the type of song in question on June 22, 1919, in the Santa Lucia Mountains, Monterey County, California, and again on May 2, 1922, in the Botanical Garden at the University of California. He says of this song: "Over and over again the bird sang the typical 'bouncing' song of the species, plus a low bubbling warble of four syllables." "They were low in pitch, and were sung softly, almost as if whispered." Hunt has discussed his theories accounting for this anomalous singing rather fully, and is inclined to believe they indicate a racial rather than an individual behavior.

I will now relate similar experiences with our eastern Chewink (*Pipilo erythrophthalmus*) which I observed in North Carolina while attending the University of North Carolina at Chapel Hill during the winter of 1904. I shall give all my journal records bearing on this strange winter singing of these birds, which passed the winter in a patch of woods there.

February 12, 1904. "Through the winter I have heard a squeaky, unusual song, if it can be so called, which I could not identify. This morning I saw a handsome male Chewink in full view on a low tree, uttering a strange, squeaky song. Is it its winter song? It was interspersed with its familiar *tur-ee - tur-ee*. It finally flew into the under-brush with a lively *tur-ee - tur-ee*, frequently repeated, as if surprised at its own strange, unfamiliar musical efforts."

February 28, 1904. "In the woods back of the Dissecting Hall, I find the Chewinks ever busy, lively, cheerful. I have this winter become acquainted with a new expression of this bird, it seems quite unknown to students of birds, and unlike its

summer song in every quality, so expressive of calmness of spirit, contentment and friendship. This new expression which I have had every opportunity to listen to carefully, watching the singer at close range, has not before been described or even so much as mentioned. Yet it seems to be rather a common expression among my chewink company in the woods mentioned, where they have dwelt, males and females, the livelong winter. Early in the winter, I was surprised to hear a peculiar bird expression delivered for some seconds in a sweet conversational way, somewhat hushed in quality. It is an almost indescribable song-babble or warble, the notes uttered in succession, with warbler-like variations. I could not at the time name the songsters; but it was not long, one morning, till I came close to the performer, a Chewink perched on a small tree singing in this new voluble fashion, interspersing his expressions with his familiar well known *tur-ee - tur-ee - tur-ee*, now uttered in an excited manner.

"This morning I again heard the Chewink at his early morning soliloquy, in the same manner as before, and watched him at a distance in a small tree, while his companions responded. Methinks this new expression of the Chewink, usually considered limited in his vocal abilities, to his usual alarm note *tur-ee* or *chee-ree*, and his short, sweet direct summer song, deserves some mention; for if it has been observed it has received no attention. Yet I doubt not if I ascribe this new note to the Chewink, increasing his known vocabulary, many will be inclined to treat it with incredulity. I have paid especial attention to the expressions of birds, and find them varied more than one usually thinks."

March 2, 1904. "This morning gave me a rare treat at close quarters with several Chewinks in their thicket-home back of the Dissecting Hall. It was a happy courtship scene, in which brilliantly attired males were trying to win the approval of the female. Again I heard its new, mysteriously soft, affectionate expressions, almost a subdued whispering chant, warbler-like. Only a few feet away, I watched the singer. It is evidently his true love-song or murmur, remotely reminding one of the Bobolink's sweetness at times, and delivered while in company with the females, and doubtless during the active courtship period, for I am well acquainted with the Chewink in New England, during its nesting season there, and know only its one sweet song. These new expressions seem intended for the females, at least bubble out spontaneously in their presence, frequently interspersed with an impatient *tur-ee - tur-ee - tur-ee*. As nearly as I can describe them, and their ecstatic spontaneous outflowing almost forbids it, they are very low, sweet complicated windings, composed of the briefest notes. It is a sweet, voluble expression of an earnest, enthusiastic soul it seems."

These complete my records of this unusual winter singing of the Chewinks. It is possible it is the usual winter song of the species, for I have never heard it in the nesting season in New England. On the other hand, during these performances or at any other time during the winter I did not hear the usual sweet ringing summer song delivered *dont-you-s-e-e-e-e*, and *see-me-e-e*, as it has always sounded to me, both ending with a ringing trill. Thoreau has aptly described it as "*whip your ch-r-r-r-r-r-r*, with a metallic ring."

Perhaps the entire Chewink race is more voluble than we have suspected, or perhaps the Chewinks like many other birds have definite seasonal variations to their songs. I do not believe this a merely casual individual behavior, but a fixed species behavior if the full truth were known of its winter habits.

Hunt elaborates rather fully on the behavior of his western towhee, feeling that "the songster is an esthete," consciously aware of deliberate improvements in his song. So his towhees to him appear to have borrowed deliberately the song of the Western House Wren as something especially fine and worthy for their art indulgence, as one loves the beauty of particular poems among humans, and would recite them now and then. It is very difficult to get at any truth concerning an animal's esthetic sensibilities, yet they may be there, even though not capable of a human evaluation. More than one person has believed that birds have a real ear for music, as does Xenos Clark, who believes that in the evolution of their songs they feel certain laws of harmonics. I am almost willing to believe anything concerning life, but sometimes I wonder just how much consciousness of directiveness is back of it all. Perhaps the bird is no more consciously concerned with an elaboration of its song than with those marvelous elaborations of its beak, or its color

pattern, or its crest or its tail feathers. Song as one phase of living behavior has gone very far with some species nevertheless, so much so that Schuyler Mathews has said, "Nearly all birds sing in strictly measured time, many sing a perfect bar, or measure, and a considerable number, several bars;" and "we have convincing proof that their music is built upon definite primitive scales—scales which the birds used aeons of years before man did." Speaking of the Hermit Thrush, this author says, "Somehow or other the motives of the Hermit all fit together in a remarkably harmonious fashion, and it is a very simple matter to combine the anti-phonal songs of two singers so they form a unit of musical thought."

There has been much observation and thought concerning the origins of bird music and insect music. The impulse is as deep as life, but how and why can be only matters of eternal speculation, and that solves nothing. Birds and insects appreciate sound in their elemental way as thoroughly as men. Somehow their songs unfold in harmony with the deep mysterious developing laws of life, just as specializations of their feet, feathers, bill, etc. We know not one thing about it, however. I would at times think it were a blind rhythm of development in the life of the bird as much as something conscious for the reason that we have marvelous specializations in the inanimate, as among snow flakes. Hundreds of different crystalline forms of snow flakes are known, some simple, others marvelously refined and specialized, yet formed within the same apparently homogeneous water, H₂O, within the same hexagonal system of crystallization. Depending upon some fine internal or external conditions, the snow flake may take on almost any form, and perhaps there are thousands of variations men have not yet seen. So it is easy to believe that life may develop complexities like the snow flakes themselves through no living control, or perchance with living control thrown in where we least expect it. The question is not going to be solved soon.

Birds have weird plasticities of behavior, as does all life, and I am convinced Chewinks are only just beginning to show us a few traits in their songs because we have stumbled upon them. Perhaps the entire Chewink race of America has this off-singing behavior observed by Hunt and myself, he in the far west, and I in the east.—H. A. ALLARD, U. S. Department of Agriculture, Washington, D. C., January 18, 1928.

Field Notes on Certain California Birds.—*Erismatura jamaicensis*. Ruddy Duck. In Grinnell and Wythe's "Directory to the Bird-life of the San Francisco Bay Region" (1927), this species is mentioned in terms indicating that it is rarely found on salt or brackish water in that region except in the winter months. On July 10, 1927, I had a good view from the train of a flock of about six males in Richardson's Bay, in the vicinity of Elmonte, a station near Sausalito, Marin County.

***Colaptes cafer collaris*.** Red-shafted Flicker. In A. B. Howell's "Birds of the Islands off the Coast of Southern California" (1917), this species is recorded from Santa Catalina Island only during the winter. On June 11, 1927, I saw a male in a small tree in a canyon near Avalon, perched close to a hole that probably contained his nest. Not being aware at the time that the species was not known to breed on the island, I did not investigate further.

***Sitta carolinensis aculeata*.** Slender-billed Nuthatch. On June 22, 1927, I saw my first bird of this subspecies in trees near Lagunita, Stanford University, Palo Alto. A few minutes later, while I was inside the little bandstand near the shore of Lagunita, Mrs. Blake, who was outside, saw him fly up under one of the tiles on the roof and disappear. During the rest of the summer, up to the time we left Stanford, he was found going to bed there nearly every evening we were able to look for him, his choice of chamber varying from the corner tile to the eleventh tile from the end. His approach was usually announced by his call from among the Monterey pines planted around the lake, after which he would appear in a pine close to the bandstand, climb up and down and "yank" a few times, and then fly up and out of sight under a tile. His hour of retiring, usually just before the sun disappeared, corresponded in a general way with the decrease in the length of day, as follows (time of sunset, furnished by the U. S. Weather Bureau, in parentheses): June 29, 7:25 p. m. (7:35); June 30, 7:24 (7:35); July 5, 7:13 (7:34); July 9, 7:10 (7:33); July 20, 7:03 (7:28); July 24, 7:04 (7:25); August 5, 6:54 (7:14); August 20, 6:43 (6:57); August 26, 6:38 (6:49).