

ica, including the entire series of the Smithsonian Institution, I find myself unable to dispose of them in any more satisfactory manner. The creation of a new race appears wholly unjustifiable, owing to the confusion in the literature of the species, the instability of the races at present recognized, and the very great individual variation that prevails amongst birds from the same locality. A final resting-place for the many puzzling specimens from the West will be found only after such a thorough overhauling of the genus *Eremophila* as cannot be based upon existing material.

NOTES ON THE NESTING HABITS OF THE YELLOW-THROATED VIREO (*LANIVIREO FLAVIFRONS*).

BY N. S. GOSS.

On the 9th of May, 1877, I found in the timber near Neosho Falls, Kansas, a nest of this bird (a pendant one, as are all the Vireos' nests I have found) attached to branches of a very small horizontal limb of a large hickory tree, about twenty feet from the ground, and ten feet below the limbs that formed the top of the tree. In the forks of the tree the Cooper's Hawks were nesting, and I discovered the Vireo and its nest in watching the Hawks — or rather the man I had hired to climb the tree to the Hawk's nest. The little bird at first flew off, but on his near approach returned and suffered him to bend the limb towards the tree and cover her with his hand on the nest. The twig was quickly broken and the bird and nest lowered by a line, in a small covered basket taken to collect the eggs of the Hawk. Such manifestations of courage and love, so rare and exceptional, touched me to the heart, and it was hard to make up my mind to rob and kill the bird and her mate, scolding in the tree-top. I can only offer in extenuation that they were the first I had met with in this State, and the *strong* desire to have them in my collection. The nest was made of, and fastened to the limb with, silk-like threads and bits of cotton from plants, fastened together

by saliva and partially covered or dotted over with lichen, and lined with small stems of weeds and grass. The beautiful nest was in plain sight, there being nothing near to hide it from view. It contained three eggs and also one of the Cow Blackbird (*Molothus ater*). One of the eggs was broken by the bird in her struggle to escape from the collector's grasp while in the nest. The color of the eggs was pure white, with a few scattering, small spots of reddish-brown towards the large end. They each measure $.79 \times .58$ of an inch. Four taken from another nest (a full set) measure $.78 \times .57$; $.80 \times .58$; $.79 \times .58$; $.78 \times .57$.

I have since noticed these birds in the woodlands on several occasions, and on the 18th of May, 1883, while strolling along the south bank of the Kansas River, near Topeka, in the timber skirting the stream, I had the pleasure to find a pair of them building a nest in a honey locust, about sixteen feet from the ground, and eight feet from the body of the tree. The nest was fastened to the forks of a small horizontal branch. The frame of the nest appeared to be completed. The birds were busy at work, the female lining the nest with small hair-like stems, the male covering the outside with soft lint-like fibrous strips from plants (these closely resembling the limb and its surroundings), and dotting it over with lichen. Happy in the thought that he was not only beautifying the home of his lady bird, but protecting her from view by his artistic skill (notwithstanding the fact that she had selected an open and exposed position), he could not refrain from expressing his joy at intervals during the work in snatches of his sweetest notes. The female, more watchful, sighted me and gave notice of the intrusion. Quick as thought the birds were away. The male, alighting near the top of an adjoining tree, at once poured forth his song in loudest notes, no doubt thinking that by attracting my attention to him I would lose sight of the nest. Knowing it was now too late for concealment, and that any attempt to hide away would only increase their suspicions and stop or delay the work, I carelessly walked nearer, in order to have a better view, and lay down on my back in an open space. In a short time the female returned, hopped about in the tree, inspected me closely from the lower limbs, and then flew away and returned several times before bringing material or venturing to approach the nest. But the moment she did so, the song of the male ceased and the work of

building was actively resumed. As the female stood upon the top of the nest, with head down and inside, I could not see the manner of arranging the lining; but as she kept walking around upon the rim, I could, in imagination, see her plaiting and weaving in and out the hair-like stems. It was very easy and interesting, however, to see and note the actions of the male, as he deftly worked the material into the framework, running the longer fibrous thread-like strips through and then quickly springing upon the top and fastening them on the inside. Then he would re-arrange the outside, stopping a moment to inspect the work, and then off in search of more material, occasionally warbling a few notes on the way; but he was silent at the nest, while I remained so near.

At the rate their work was progressing, I think the nest would have been completed during the day. I do not know that it is the usual custom for the female to confine her labor to the plain and necessary work, and the male to the decorative and ornamental parts, but it was so in this case. It may be that the time of laying was near at hand, and that the female felt the pressing necessity for the completion of the interior, for, in such cases, I have seen nests of birds enlarged and completed by the males while the females were sitting upon their treasures.

A STUDY OF THE SINGING OF OUR BIRDS.*

BY EUGENE P. BICKNELL.

CONSIDERATION OF SPECIES.

Turdus migratorius. ROBIN.

As a general rule our summer song-birds come to us in the spring in full voice; but an exception is often made by the Robin. As a few Robins may be with us all winter, it is not always easy to tell just when the first spring birds come; but the observations of several years clearly show that, as a rule, first arrivals are songless. But singing is rarely delayed after the migration has

* Continued from p. 71.