

A STUDY OF THE AVIFAUNA OF THE LAKE
ERIE ISLANDS.

(With Particular Reference to the Migration Phenomena.)

BY LYNDS JONES.

(Continued from page 18.)

The summer study on Pelee Island in 1910 began on July 16, when two men, accompanied by their wives, landed at the camping ground on Fishing Point among the red cedars. Except for one visit of a night and a day to oversee the work on the part of the writer, these two men continued the work without other assistance for two weeks, at the end of which time the remainder of the company reached the island. The entire company was composed of nine men and two women and the teacher. The two men and their wives left on August 26, and on September 2 one of the remaining men was taken to a hospital in Sandusky. On this same day two other men came to our camp and remained with us until our final departure on the 7th of September. While these two men were visitors they assisted in the work. It will be seen that the work began early enough to make a thorough study of the avian conditions of the island before the migrations began, thus affording interesting studies of the ecological conditions of the summer resident birds, and furnishing means of comparison between the summer status and the conditions during the migrations.

It must be understood that there was no such intensive study of the island as a whole as was made of the Fishing Point and its immediate environs, but enough study of the whole island was made to give a fair idea of the conditions as far as the bird life is concerned.

Quite contrary to what we had been led to suppose, Pelee Island is by no means one big marsh bordered by a lake beach all around. Nearly the whole southern fifth of the island is high ground underlaid by lime rock, presumably of the Niagara formation. A somewhat

rounded area one mile in width by nearly a mile and a half in length of similar high ground underlaid by stone occupies the eastern side, a little north of the middle, and an area of about half the dimensions occupies the middle and base of the north-eastern point, while a larger area forms the north-western point, extending also to the middle of the North Bay, and down the west shore nearly two miles. The interior, which is more than half surrounded by these high limestone areas, was once a marsh, but all of it has been drained out and is cropped every summer. The staple crop is tobacco — the same kind that is raised in Kentucky. Corn, oats, wheat, and potatoes are also grown. The only swamps upon the island now are a somewhat extensive one which occupies the north end of Light House Point. This covers an area rather less than 500 acres. There is a smaller marsh bordering the middle of South Bay, and one of perhaps thirty acres on the east side of the base of Fishing Point. There is also a very small muck swamp, of much less than an acre, on the west side of Mosquito Point. Thus the conditions which prevail on this island are now quite dissimilar from those on Point Pelee as reported by Taverner and Swales.*

Of course Fishing Point runs out into the lake much as the extreme point of Point Pelee does, and conditions here are the same. It might be said, however, that conditions on Fishing Point are much nearer primitive than is the southern end of Point Pelee. Fishing Point contains no dwellings, and the single narrow road is almost no disturbance to the forest. We were told that in the earlier days the island was densely wooded with red cedars. There is still evidence that the higher areas were covered by deciduous forests.

That Fishing Point is gradually being shifted west there is abundant evidence in the cutting away of the east beach and the building up of the west beach, as well as the submerged roots and stumps of huge trees now rods from the east beach. Every year witnesses the overthrow of trees, some of them of more than a foot in diameter, on the east

* Wilson Bulletin 19, p. 39 *et seq.*

side of the Point, and the self-planting of trees on the west side. The series of parallel ridges are parallel to the west side, but not to the east side.

A summary of the work done follows in the language of two of the students, supplemented later by a list of the birds and their dates of occurrence. These reports undertake to give a brief survey of the more prominent ecological features that have some bearing upon the distribution of the birds.

REPORT ON THE ECOLOGY OF PELEE ISLAND, SUMMER OF 1910.

Part I.

BIRD CONDITIONS BEFORE THE BEGINNING OF MIGRATIONS.

Before the beginning of the migrations the birds were divided into four distinct groups ecologically; one of which has several further subdivisions. These are the birds found in the woods on the point, the marsh birds, the water and beach birds, and the birds found inland, mostly about cultivated fields or small woodlots.

Under the first group, that of the woods birds, there are three subdivisions, the birds of the cedars, the birds of the deciduous belt, and the birds that frequented both indiscriminately.

The birds found distinctively among cedars were the Screech Owl, Cardinal, Cedar Waxwing, Pine Warbler, and Brown Thrasher. Of these Cardinal, Cedar Waxwing, and Thrasher deserve especial mention because of their great abundance, especially considering the northern locality. The Pine Warbler must have nested there, which is a good record. The Screech Owl was probably seen only in the cedars because we were there most after dark.

Of the birds seen only in the deciduous belt, the Hairy, Downy and Red-headed Woodpeckers stayed among the tall trees with dead tops, found at the base of the point. The Blue Jay, Warbling Vireo and Crested Flycatcher, as well as the Black-billed Cuckoo, also stayed in these tall trees, among the dense foliage. The Towhee and Catbird stayed in the