Bæolophus inornatus griseus. GRAY TITMOUSE.— Common in the juniper and piñon pines of the Upper Sonoran zone.

Parus atricapillus septentrionalis. Long-tailed Chickadee.— Found in the Pecos Mountains.

Psaltriparus plumbeus. Lead-colored Bush-tit.—Fairly common in the junipers. On the side of Mesa del Agua de la Yegua it was found as high as 6500 feet.

## A PRELIMINARY LIST OF THE BIRDS OF LEON COUNTY, FLORIDA.

BY R. W. WILLIAMS, JR.

The present list is the result of spare moments devoted to ornithology since the summer of 1896. I had hoped, ere this, to present a more complete and satisfactory catalogue of the birds of my county, but the extensive field has proved too broad for the limited time I could give to the subject. I intend this as a basis for future work and publish it now in the hope that it may be of some value to workers in geographic distribution.

It will be noticed that many species, particularly of the Mniotiltidæ, which occur in the peninsula are not recorded here and I feel safe in asserting that they do not come to my part of Florida. They may pass over during migration but continue their course uninterruptedly to some other portion of the State. A few ducks which undoubtedly occur have escaped me. Some of the Limicolæ are not recorded, but that they occasionally visit the county there can be no doubt. I have here recorded only those species about which there could arise no question; have carefully eliminated inferences without strong evidence to support them, and where necessary have given the authority upon which I rely. The list has been annotated as briefly as was consistent with accuracy and a fair presentation of the subject.

A word about the topography and climate was considered advisable, and though very general, it is hoped will convey an idea of the country.

Leon County is one of the northern tier of counties, bounded on the north by Georgia. It occupies almost a central position between the eastern and western extremities of the State.

Tallahassee, the county seat and capital of the State, lies almost midway between Jacksonville and Pensacola, being 165 miles west of the former and 210 miles east of the latter. Forty miles south lies the Gulf of Mexico.

We generally have an abundance of rain at all seasons. A drought of about a month's duration may occur at any season. A few sporadic days in winter are apt to be severe, but are soon followed by springlike, balmy weather.

The northern half of the county is fertile and rolling, everywhere dotted with sheets of water of varying size, from Lake Jackson, 12 miles long, to the smallest mud holes. Innumerable streams dissect the county. The lakes and larger ponds provide suitable haunts for large numbers of water-fowl and their marshes are feeding grounds for several species, notably the Snipe (Gallinago).

The southern half is flat, sandy, and sterile. Cypress swamps occur throughout this region, furnishing favorite nesting places for Herons and Anhingas.

The vegetation is varied. That of the northern half of the county is rich in variety and luxuriance, presenting some of the most beautiful scenery in the South.

Oaks of several species, draped with Spanish moss, hickories, sweet gums, magnolias, and pines of the more attractive sort, constitute the forest trees, and everywhere interspersed among these are found the dogwood, sassafras and holly, aside from the plethora of minor shrubbery. That of the southern half is very different, the characteristic trees being the ever present pine and a species of scrub oak we call black-jack, just such vegetation as one would expect to find in such soil. Everywhere throughout these great pineries will be found the palmetto in great abundance. All this interminable monotony is, however, now and then relieved by the appearance of a small tract of fairly fertile soil, supporting a vegetation characteristic of the northern part of the county. An occasional pond is met with, around which will be found clusters of sweet guins and water oaks. As might be expected from the foregoing, the greatest abundance of bird life occurs in the northern half of the county.

At some future time I hope to contribute to ornithological literature a complete list of the birds of my county, with a detailed account of the climate and topography. For the present the foregoing brief notice must suffice.

- 1. Podilymbus podiceps. PIED-BILLED GREBE.—Common resident, retiring to smaller and more secluded ponds in spring, where they remain throughout the nesting season.
- 2. Anhinga anhinga. Anhinga. Rather common summer resident in suitable localities, nesting in cypress swamps and feeding in the shallow ponds in the vicinity. I have found eggs as early as April 13 and as late as June 16, the latter date indicating disaster to the first set. Have no record of occurrence in winter, though it is probable that it may be found sparingly.
- 3. Lophodytes cucullatus. Hooded Merganser. Rather common winter resident, found in the lakes and larger ponds.
- 4. Anas boschas. Mallard. Common winter resident, frequenting the lakes and larger ponds, occasionally met with in smaller bodies of water.
- 5. Mareca americana. BALDPATE. Winter resident, occurring only in small numbers and chiefly confined to the larger lakes.
- 6. Nettion carolinensis. Green-winged Teal. Common winter resident.
- 7. Querquedula discors. Blue-winged Teal. Common winter resident.
- 8. Spatula clypeata. Shoveller. Winter resident, in limited numbers.
- 9. Dafila acuta. PINTAIL. Winter resident of more or less abundance.
  - 10. Aix sponsa. WOOD DUCK. Resident, but not abundant.
- 11. Aythya marila. AMERICAN SCAUP DUCK.—Common winter resident, found in company with affinis and collaris.
- 12. Aythya affinis. Lesser Scaup Duck. Common winter resident. One of the most abundant of all ducks.
- 13. Aythya collaris. RING-NECKED DUCK. Common winter resident. The most abundant of the Anatidæ.
- 14. Harelda hyemalis. OLD-SQUAW. Rare winter resident. I have one specimen.
  - 15. Branta canadensis. Canada Goose. Rare winter visitant.
- 16. Tantalus loculator. Wood Ibis. A summer resident of more or less abundance, frequenting the shores of lakes and ponds. I have no doubt that their nests may be found in some of the remote cypress swamps of the county. They are gregarious.
- 17. Botaurus lentiginosus. American Bittern. Fairly common winter resident, frequenting the grassy shores and shallow pools of the larger lakes, sometimes found in the vicinity of the smaller ponds.

- 18. Ardetta exilis. Least Bittern. Formerly quite abundant in spring and summer, nesting in bushes and weeds in and around small ponds. From some unaccountable cause they have almost entirely disappeared from the county.
- 19. Ardea herodias. Great Blue Heron. Rather a common resident, nesting in the cypress swamps. Very wary at all times. I have been unable to determine the status of this heron, as I have failed to take a specimen. It is possible that it should be referred to the subspecies wardi.
- 20. Herodias egretta. AMERICAN EGRET. Rare summer resident. I found a nest and young on April 24, 1901, in a small cypress swamp three miles west of Tallahassee.
- 21. Egretta candidissima. Snowy Heron.—Common summer resident, nesting in the cypress swamps in conjunction with F. cærulea.
- 22. Hydranassa tricolor ruficollis. Louisiana Heron.—Summer resident of more or less abundance. Occurs in large numbers on the Gulf coast of the county just south of us.
- 23. Florida cærulea. LITTLE BLUE HERON.— Common summer resident, arriving in the last of February. Becomes common about March 15. Nests in cypress swamps. I have seen no less than one hundred nests in a single group of small cypress trees.
- 24. Butorides virescens. Green Heron.—Common summer resident, nesting in almost any locality where a supply of water may be found. Very solitary in its habits.
- 25. Nycticorax nycticorax nævius. BLACK-CROWNED NIGHT HERON. Summer resident. Nests in cypress swamps, often in the rookeries of Little Blue and Snowy Herons, but usually in higher situations. Have found eggs about to hatch on April 13 (1895).
- 26. Rallus elegans. King Rail.—Rather common resident, more often heard than seen. It nests in the tangled masses of aquatic vegetation
- 27. Rallus virginianus. VIRGINIA RAIL.— An uncommon winter resident.
- 28. Porzana carolina. Sora.—Rather common winter resident; difficult to flush from its haunts of tangled weeds in the marshes of the lakes and ponds.
- 29. Ionornis martinica. Purple Gallinule.—Common resident. Nests in the smaller grassy ponds and bayous of the large lakes.
- 30. Gallinula galeata. FLORIDA GALLINULE.—Common resident. Nests in same localities as the preceding.
- 31. Fulica americana. American Coot.— Common winter resident. Occurs in enormous numbers on Lakes Jackson and Iamonia. They are shot by the negroes for food.
- 32. Philohela minor. American Woodcock.— Occurs throughout the year in limited numbers. Flushed one in a thicket on the marsh. August 30, 1901.

- 33. Gallinago delicata. Wilson's Snipe.— Common winter resident, frequenting almost any marshy locality. Occurs in great abundance on the marshes of our lakes and larger ponds during the spring migration. I have even found them feeding on the hillsides in very wet weather. Large numbers are annually shot by hunters. Gallinago is easy prey in the south where their flight is less erratic and not so swift as I am informed that it is in the north. A friend of mine killed sixty odd in a single day's shooting on Lake Jackson a few winters ago. They are less abundant than formerly. They leave the State about April 15, and I have an arrival record of October 3 (1901).
- 34. Helodromas solitarius. Solitary Sandpiper.—Occurs sparingly in the early spring, frequenting marshy land wherever it may be found. Shot one and saw a few others on March 25, 1901.
- 35. Bartramia longicauda. Bartramian Sandpiper.— An occasional winter visitor in very wet weather; usually occurs in the spring. Shot one and saw about five others on March 25, 1901. They are extremely wary and difficult to approach.
- 36. Oxyechus vociferus. KILLDEER.—Very common winter and early spring resident, occurring sparingly throughout the year. Indifferent in its tastes for locality, for you are as likely to find it on high and dry lands as on the marshes. It is very active during the hours of darkness. Forms an object of sport for the younger nimrods. I have one record of its nesting in the county. A set of four eggs was taken several years ago by a friend.
- 37. Colinus virginianus. Bob-WHITE.— Common resident. Our birds approach more nearly the common form, but are considerably darker, especially in the region of the head. It is quite probable that *floridanus* may be found in the southern part of the county. Some of the finest 'quail' shooting in this country is still to be had in Leon County.
- 38. Meleagris gallopavo silvestris. WILD TURKEY.—Resident; formerly common, now restricted to wilder portions of the county.
- 39. Zenaidura macroura. Mourning Dove. Common resident. Much more abundant in winter. Nests usually in pines. Large numbers are annually killed for sport and food. Its flesh is held in high estimation.
- 40. Columbigallina passerina terrestris. GROUND DOVE.—Resident. Formerly abundant at all times, now, from some unaccountable reason, exceedingly rare at any time. Its total disappearance for the space of twelve months in very recent years is one of the mysteries of Leon County ornithology. Latterly it has returned in very limited numbers.
- 41. Cathartes aura. TURKEY VULTURE.— Common resident. Frequents the city in larger numbers than Catharista and is more nearly domesticated. It performs valuable sanitary functions, ridding our yards and streets of much offal and excrementitious substances. It is exempt from even the recklessness of boys and enjoys immunity from danger everywhere. Though as common as the following species, its nests are seldom found.

- 42. Catharista urubu. BLACK VULTURE. Common resident. Of retiring habits during the nesting season, which begins as early as February 20. Less frequently seen in the city than Cathartes, though it will be found in large numbers during winter, roosting in the tall moribund red oaks so abundant in Tallahassee. It is impossible for one to divest himself of the gloomy effect such a sight produces upon his senses. The sable pall stands out in bold relief against the clear, moonlit sky and the assemblage seems one of chief mourners at some august funeral. It is likewise exempt from the devastating hand of man.
- 43. Elanoides forficatus. Swallow-Tailed Kite. Of occasional occurrence in the spring, either singly or in flocks. I have no record of its nesting.
- 44. Ictinia mississippiensis. Mississippi Kite.—Of irregular occurrence in spring. Never present, so far as I am able to determine, except in 'flights,' lasting usually only long enough to accomplish a leisurely journey across the county. While so travelling they are invariably engaged in most graceful and complex evolutions. Notwithstanding the assertion that they occur only in flights of short duration in spring, I feel obliged to refer to a single egg sent a few years since to the National Museum for identification and pronounced to be the egg of an Ictinia. I have not seen the egg recently. It was found in a nest, about 30 feet up in a pine, near a public highway, by my friend Gilman J. Winthrop, and is now in our joint collection at his home in Tallahassee. This establishes a nesting record for the species in Leon County, but it is certain that the bird is a very infrequent summer resident.
- 45. Circus hudsonius. Marsii Hawk.—Rather common winter resident, usually seen flying over old well-weeded fields in pursuit of its humble prey.
- 46. Accipiter velox. Sharp-shinned Hawk.—Resident. I have no nesting records.
- 47. Accipiter cooperii. Cooper's Hawk.— Common resident. Nests usually placed in a pine. Very troublesome around the poultry yard.
  - 48. Buteo borealis. RED-TAILED HAWK.— Common resident.
- 49. Buteo lineatus alleni. FLORIDA RED-SHOULDERED HAWK.— Common resident. Have been unable to determine its exact status.
- 50. Buteo platypterus. BROAD-WINGED HAWK.— Common resident. Fresh eggs are found about May 1.
- 51. Haliæetus leucocephalus. Bald Eagle. Resident in limited numbers. One set of two eggs was taken December 22, 1896, by my friend Winthrop.
- 52. Falco columbarius. PIGEON HAWK.—Rare migrant, so far as known. Have taken one, October 12, 1901.
- 53. Falco sparverius. American Sparrow Hawk.— Common resident.
- 54. Pandion haliaëtus carolinensis. American Osprey.— Found sparingly throughout the year. One nested on an island in Lake Iamonia a few years since.

- 55. Strix pratincola. American Barn Owl.—Rather common resident, nesting as early as December 10 (1901). I have found nests in the large red oaks within the city limits.
- 56. Syrnium varium alleni. FLORIDA BARRED OWL.— Resident, in some abundance.
- 57. Megascops asio floridanus. FLORIDA SCREECH OWL.— Common resident. Begins nidification by April 1.
- 58. Bubo virginianus. Great Horned Owl.—Rather common resident.
- 59. Coccyzus americanus. YELLOW-BILLED CUCKOO.— Common summer resident, nesting in diverse situations. Is fond of trees along public highways for nesting sites. Fresh eggs have been taken on August 11 (1900). I have a set of six eggs.
- 60. Coccyzus erythrophthalmus. Black-billed Cuckoo. Occurs sparingly in summer. One record of its nesting.
- 61. Ceryle alcyon. Belted Kingfisher.—Rather common summer resident and occurs sparingly in winter.
- 62. Campephilus principalis. IVORY-BILLED WOODPECKER. Formerly a fairly common resident, now restricted to dense forests and cypress swamps, if it occurs at all. A few have been killed in the last 15 years and one of our citizens were a pair of mandibles as a watch-charm, taken from a bird he shot about seven years ago.
- 63. Dryobates villosus audubonii. Southern Hairy Woodpecker. Rare resident.
- 64. Dryobates pubescens. Downy Woodpecker. Common resident.
- 65. Sphyrapicus varius. YELLOW-BELLIED SAPSUCKER. Rather common winter resident.
- 66. Ceophlœus pileatus. PILEATED WOODPECKER. Resident; confined to the larger tracts of woodland. More common in southern part of the county.
- 67. Melanerpes erythrocephalus. Red-headed Woodpecker. Common summer, and less abundant winter, resident. The commonest woodpecker in the county. Found usually in the forests of decaying pines so abundant throughout the county.
- 68. Centurus carolinus. Red-bellied Woodpecker. Common resident. Shows a preference for dead portions of living trees for nesting site.
- 69. Colaptes auratus. FLICKER. Common resident. Not so much sought after as an article of food as formerly.
- 70. Antrostomus carolinensis. CHUCK-WILLS-WIDOW. Common summer resident, arriving about April 1; occasionally seen in winter, but not of constant occurrence. My friend Winthrop saw one December 28, 1903.
- 71. Antrostomus vociferus. Whip-poor-will. Rare at any season. The only authentic record of its occurrence, if indeed it is a valid record,

rests upon a set of eggs taken several years ago by one of the numerous juvenile egg collectors in Tallahassee. I saw the eggs then and commented upon their very small size and expressed the belief that they could not be those of *carolinensis*. I am confirmed in my conviction that the set was one of this species. I have never seen the bird nor heard its notes.

- 72. Chordeiles virginianus. NIGHTHAWK. Common summer resident, though its nest is not frequently found. I have never taken its eggs. During the spring it is retiring and seldom seen, but later in the season it begins to emerge from its seclusion and in large numbers scours the air from 5 o'clock till after nightfall. Often seen early in the morning by those of more energetic habits than the writer. This bird furnishes sport for those persons devoted to the gun and enormous numbers have been slaughtered annually for years past. While they are primarily shot for 'sport,' their flesh is held in high regard, and I can testify to their delightful flavor while I deprecate the sacrifice. As would be expected, they have greatly decreased in numbers in the last five years. Public sentiment has not yet stamped its disapproval on this worse than useless destruction.
- 73. Chætura pelagica. Chimney Swift. Common summer resident. Arrives about March 28. Records for arrival for three years are: 1901, March 26; 1902, March 27; 1903, March 28. They remain long after the bulk of summer residents have gone. Of late years they have suffered reverses in procuring available nesting sites on account of their own bad manners. I have known of some costly carpets almost wholly ruined by them. After the nesting season they collect in enormous numbers every evening, circle over and dive into certain attractive chimneys, loosen the soot in their fluttering and precipitate the black matter into the room below. The result is apparent. This has necessitated the resort to wire netting over the tops of most of our chimneys and the birds must soon return to their ancient custom of nesting in old trees or abandon our county. I deprecate the day when such a cheerful little visitor must avaunt.
- 74. Trochilus colubris. Ruby-throated Hummingbird. A' summer resident, very retiring during the nesting time. Have only one record of its nest and eggs.
- 75. Tyrannus tyrannus. KINGBIRD. Common summer resident, arriving about April 1; gregarious during late summer and very silent. Records of arrival for four years are: 1900, March 27; 1901, March 25; 1902, March 30; 1903, April 3.
- 76. Myiarchus crinitus. CRESTED FLYCATCHER. Common summer resident, arriving about April 1. Records of arrival for three years are; 1901, March 31; 1902. March 30; 1903, April 4.
- 77. Sayornis phœbe. Phœbe. Common winter resident. Found them common October 11, 1901, and they were still present March 25, 1902. Never occurs in summer.

- 78. Contopus virens. Wood Pewee. Migrant. Never abundant. Took one in my yard September 4, 1901.
- 79. Empidonax flaviventris. Yellow-bellied Flycatcher. Rare migrant in fall. Collected one October 11, 1901.
- So. Empidonax traillii alnorum. Alder Flycatcher.—Rare migrant. Collected one August 6, 1900.
- 81. Pyrocephalus rubineus mexicanus. Vermilion Flycatcher.— On March 25, 1901, I shot an adult &, three miles east of Tallahassee. The bird was in excellent condition and seemed perfectly at home on smaller bushes and a wire fence around Lake Lafayette. The specimen is now in the Smithsonian Institution collection of birds. For notice of the capture see Auk, XVIII, 273.
- 82. Cyanocitta cristata florincola. FLORIDA BLUE JAY.— Very common resident; begins nesting by April 1 and continues till late in August.
  - 83. Corvus brachyrhynchos. American Crow.—Common resident.
- 84. Dolichonyx oryzivorus. BOBOLINK. Migrant. Very erratic, occurring at irregular intervals during spring. Sometimes lingers several days to feed on the oats and millet. When present they are very numerous.
- 85. Molothrus ater. Cowbird.—Exists now in vivid recollection only. The bird was common in Leon County up to 1893, since which time I have never seen a single specimen, although I have made every effort to find it. Its disappearance is one of the mysteries of ornithology and a parallel case to the "Disappearance of the Dickcissel from the District of Columbia."
- 86. Agelaius phœniceus. Red-winged Blackbird.—Common resident, more numerous in summer. Highly gregarious in winter, feeding in the tall weeds of old cornfields. The male assumes the plumage of the female at this season.
- 87. Sturnella magna. Meadowlark. Common resident. Very retiring in the nesting season.
- 88. Icterus spurius. Orchard Oriole.—Common summer resident. Record first arrival, a male, of 1902 on March 23. Begins to nest very soon after arrival. Pear groves are favorite nesting places for them. I have seen many nests in a radius of three acres. They are very fond of the long, pendant clusters of Spanish moss hanging in such graceful festoons from our large water and live oaks for nesting sites. Before they leave in late summer or early fall they become very retiring and quiet.
- 89. Icterus galbula. Baltimore Oriole.— A rare migrant. I shot one, a female, in our yard on March 3, 1902.
- 90. Euphagus carolinus. Rusty Blackbird.—Migrant in spring. Occasionally seen following the ploughmen, gleaning what food it can from the newly turned soil.
- 91. Quiscalus quiscula aglæus. FLORIDA GRACKLE.— Common summer resident, arriving in February.

- 92. Astragalinus tristis. American Goldfinch.—Common winter resident, the male arriving in and retaining the plumage of the female.
- 93. Poœcetes gramineus. Vesper Sparrow.— Common winter resident. It is the most abundant sparrow with us, likely to be seen in any locality, but its favorite haunts are the old cotton fields. On January 22, 1902, I shot an albino specimen. This bird was entirely white. They were still with us on April 13, 1902.
- 94. Passerculus sandwichensis savanna. Savanna Sparrow.— Of infrequent winter occurrence. I have only one record.
- 95. Coturniculus savannarum passerinus. Grasshopper Sparrow. Common winter resident; remains in small numbers late in spring. One record as late as April 27 (1902).
- 96. Zonotrichia albicollis. White-throated Sparrow.— Very common winter resident. A dooryard bird of fascinating demeanor and confiding habits. They congregate in large flocks in April, preparatory to leaving. The latest record of their presence is May 3 (1903), when I saw two.
- 97. Spizella socialis. Chipping Sparrow.—Common winter resident.
  - 98. Spizella pusilla. Field Sparrow. Common winter resident.
- 99. Peucæa æstivalis bachmanii. Bachman's Sparrow.—Common winter resident. Usually flushed close to one's foot, from dense broomsedge undergrowth in pine thickets. As soon as flushed it flies to the higher branches and sits there in a rigid posture with an expression of terrified emotions. It is rather a solitary bird.
- 100. Melospiza cinerea melodia. Song Sparrow.— Winter resident, of less abundance than several other sparrows. It does not sing with us.
- 101. Melospiza georgiana. SWAMP SPARROW.—Common winter resident, remaining, sometimes, late in spring. It frequents high broomsedge fields as readily as it does the weedy marsh.
- 102. Pipilo erythrophthalmus. Towhee.— Resident. Common in winter, not nearly so abundant in summer.
- 103. Pipilo erythrophthalmus alleni. WHITE-EYED TOWHEE.— Not so abundant as the preceding. Do not believe it occurs in summer.
  - 104. Cardinalis cardinalis. CARDINAL.— Common resident.
- 105. Zamelodia ludoviciana. Rose-breasted Grosbeak.—Of very infrequent occurrence. Recorded once by my friend Winthrop. I have never seen it.
- 106. Guiraca cærulea. Blue Grosbeak.— Summer resident, but not abundant. The only nest I have ever seen was on June 14, 1903. It contained four half-grown young.
- 107. Cyanospiza cyanea. Indigo Bunting. Migrant. Passes through the county irregularly in spring. Never abundant.
- 108. Cyanospiza ciris. PAINTED BUNTING.—The appearance of this bird in Tallahassee in the latter part of April, 1901, is very little less remarkable than the disappearance of the Cowbird about 1893. So far as

I have observed or learned, the bird has made its appearance in my county but once. On the 23rd of April, 1901, I was summoned to the home of a lady friend to identify for her certain little birds which had lately made her back yard a temporary home. Arriving there late in the evening I found a number of these birds quietly feeding in the grass of her lawn. Though I had not before seen the species, it was no difficult task to identify them. She said they had been there for four days. I did not find them elsewhere, and they disappeared in a few days as mysteriously as they had come. I was told by reliable citizens of Apalachicola that the birds were such a pest there at this time that the people of the city were obliged, in their opinion, to protect their gardens by resort to the gun. I can account for this unusual occurrence of the bird in northern Florida upon one hypothesis only. Just at this time a fearful storm raged on the Gulf coast just to the south of Tallahassee. Many vessels were wrecked, and houses destroyed in one of the seacoast towns. Much of the wind and some of the rain reached my county. This may have driven the birds inland during their migration.

- 109. Piranga erythromelas. Scarlet Tanager.—I have but one record of its occurrence in the county.
- 110. Piranga rubra. Summer Tanager.—A common summer resident; nests abundantly. Arrives about March 30. After the nesting season and before leaving in the fall they become very recluse.
- 111. Progne subis. Purple Martin.—Common summer resident, arriving in some numbers by February 15. Records for arrival for three years: 1901, Feb. 20, 2 males; 1902, Feb. 14, 3, 2 males, 1 female; 1903, Feb. 8, 2. Those that come first remain. They are well established in their summer quarters by the middle of March. I always erect for them a house in our backyard and one of the pleasantest features of the long summer is the cheerful note of this bird. They begin to quit their nesting places about the middle of June, when they betake themselves and their young to the topmost branches of the tallest oaks, there to remain till the young are able to shift for themselves. They leave the county about the middle of July, but occasionally large flocks may be seen passing over till the middle of September. My latest record is September 27 (1901).
- 112. Iridoprocne bicolor. TREE SWALLOW. Migrant, occurring at irregular intervals, remaining only a few days. My records are: 1900, April 29 and May 5; 1902, March 30; 1903, March 26.
- 113. Riparia riparia. BANK SWALLOW.—So far as I can learn it is a migrant only, visiting the county in spring and late summer. I have seen it in numbers on April 16 (1900) and August 28 (1901). It is said to nest abundantly at St. Marks.
- 114. Ampelis cedrorum. CEDAR WAXWING.—Common winter resident, prolonging its stay late into the spring. Arrives very irregularly, sometimes in October and again not until a month and a half later. My earliest record of appearance is October 19 (1901), the latest May 8 (1903).

They feed extensively on the berries of mistletoe, wild olive (*Prunus*) and China tree. Sometimes found in company with bluebirds and often feeds with robins.

- 115. Lanius ludovicianus. Loggerhead Shrike. Common resident.
- 116. Vireo olivaceus. Red-Eyed Vireo. I cannot regard this bird as anything else than a rare resident. I have never found its eggs, but have seen an old nest. It probably passes further south in winter, my latest record being October 10.
- 117. Vireo flavifrons. Yellow-throated Vireo. Rare migrant; one record only, October 15, 1900.
- 118. Vireo noveboracensis. WHITE-EYED VIREO.—Perhaps resident, though I have no summer record for the county. I found it in Franklin County, near the Gulf coast, in July and August, 1901. It is not a common bird in winter.
- 119. Mniotilta varia. Black and White Warbler.—Winter resident, but not common. Arrives in August, remains till April. My earliest and latest records are August 5 (1896) and March 31 (1901).
- 120. Protonotaria citrea. Prothonotary Warbler. Summer resident, but not common. I have taken two sets of eggs, the last April 29, 1899. In both cases the nest was in a cypress swamp.
- 121. Helminthophila bachmanii. Bachman's Warbler. Only one record. I took this specimen on August 4, 1900.
- 122. Compsothlypis americana. PARULA WARBLER.—So far as I have been able to discover, this is a migrant only. I found it quite abundant on August 6, 1896, and in March, 1903. I have no records for any other month, though it is probable that it occurs in September and April.<sup>1</sup>
- 123. Dendroica æstiva. Yellow Warbler.—I believe this is a migrant only, although I found it rather common in Franklin County between July 20 and August 1, 1901. It is not resident with us in winter.
- 124. Dendroica coronata. Myrtle Warbler. Common winter resident; one of the commonest birds we have. Spends much of its time on the ground; almost a terrestrial bird in Leon County. It moults before leaving for the north in spring.
- 125. Dendroica dominica. YELLOW-THROATED WARBLER Common summer resident; nests early. As I have a record for January 3 (1901), it is probable that the bird is a resident.
- 120. Dendroica vigorsii. PINE WARBLER. Resident; more abundant in winter.
- 127. Dendroica palmarum. PALM WARBLER.—Winter resident, spending most of its time on the ground.

<sup>&</sup>lt;sup>1</sup>Since writing the above I have discovered evidence that quite conclusively proves that this species nests in the county. I collected two specimens, one undoubtedly young of the year, on July 23, 1904.

- 128. Dendroica palmarum hypochrysea. Yellow Palm Warbler.— Winter resident; rather common; found associated with the preceding.
- 129. Dendroica discolor. PRAIRIE WARBLER. Migrant. I have no record except for August. Found it rather common on James Island, in Franklin County, between July 20 and August 1, 1901.
- 130. Seiurus aurocapillus. Oven-BIRD. Rare migrant. Have seen but one, March 2, 1902.
- 131. Geothlypis trichas. MARYLAND YELLOW-THROAT. Common resident, nesting around marshes and ponds, retiring to high land in winter; it is a common hedge-row bird at this season.
- 132. Icteria virens. Yellow-breasted Chat. Summer resident; not common. A few nests have been found.
- 133. Wilsonia mitrata. Hooded Warbler. Migrant; never abundant. I have no record of its occurrence between April 13 and July 16, and no winter record.
- 134. Setophaga ruticilla. AMERICAN REDSTART.— Migrant; lingers a short time in fall. My earliest record is August 28, 1901, when I saw two males. Saw another in Franklin County on September 21, 1901.
- 135. Anthus pensilvanicus. American Pipit.— Probably a winter resident in small numbers. I have never seen it. It has been taken once and seen several times by Winthrop.
  - 136. Mimus polyglottos. Mockingbird.—Common resident.
- 137. Galeoscoptes carolinensis. Catbird.— Winter resident, but not common. Remains as late in spring as April 27 (1901).
  - 138. Toxostoma rufum. Brown Thrasher.—Common resident.
- 139. Thryothorus ludovicianus. CAROLINA WREN.— Common resident.
- 140. Thryomanes bewickii. Bewick's Wren.—Rather common winter resident.
  - 141. Troglodytes aëdon. House Wren.—Common winter resident.
- 142. Olbiorchilus hiemalis. Winter Wren.—Winter resident, in small numbers.
- 143. Cistothorus stellaris. Short-billed Marsh Wren.—Rather common winter resident.
- 144. Certhia familiaris americanus. Brown Creeper.—Have never seen it. There is one record of its occurrence. This one flew into the house of a friend and was captured.
- 145. Sitta pusilla. Brown-headed Nuthatch.— Resident, not common. Have taken two sets of eggs.
- 146. Bæolophus bicolor. TUFTED TITMOUSE.— Rather common resident.
- 147. Parus carolinensis. Carolina Chickadee.— Common resident.
- 148. Regulus satrapa. Golden-Crowned Kinglet.— Common winter resident; may pass further south for a brief period.
- 149. Regulus calendula. Ruby-Crowned Kinglet.— Common winter resident.

- 150. Polioptila cærulea. BLUE-GRAY GNATCATCHER.— Summer resident.
- 151. Hylocichla mustelina. Wood Thrush.—Rare migrant in spring.
- 152. Hylocichla guttata pallasii. HERMIT THRUSH.— Common winter resident. They seem to be distributed, two or three to each piece of woodland.
- 153. Merula migratoria. ROBIN.—Common winter resident. Feeds extensively on the berries of China tree, dogwood and olive tree (*Prunus*). Large numbers of them are frequently seen feeding on the recently burned marshes of the large lakes and ponds. The bird's bill has changed to black before it reaches our borders. They reach northern Florida about November I, and are not common till the 20th. By April 15 they have disappeared. The Legislature has placed them on the game list.
- 154. Sialia sialis. BLUEBIRD.—Common resident. In the past two years its numbers have been appreciably augmented and it seems now on the road to recovery from the disastrous winters of 1894 and 1899.

## ADDENDA.

This article was prepared in the spring of 1904 from notes which I then had with me in Washington. Since its completion I have returned to my home and in the brief space of a month, in the midst of other duties, added two species to the list.

- 155. Actitis macularia. Spotted Sandpiper.—One heard during the early part of the night of August 5, 1904. Much rain had fallen for several days and the streets were running with water. The bird was feeding in the street in front of our yard. Its characteristic notes could be plainly heard when it shifted its position from one side of the street to the other.
- 156. Seiurus motacilla. Louisiana Water-Thrush.— First record of the species was made on July 23, 1904, when I saw one and heard another.