

Report on Spring Migration for the Years 1922-24

SINCE its organization in 1890, the D. V. O. C. has devoted much of its attention to the study of bird migration, and since the appearance of the first issue of CASSINIA in 1900, a yearly report on the spring migration in eastern Pennsylvania, southern New Jersey and Delaware has been published, with notes on unusual birds, nesting dates etc., covering other parts of the year. Necessarily other ornithologists, not members of the Club, have been enlisted in this work, and each year schedules furnished by the Club for the purpose have been filled in and returned by from 20 to 80 observers.

In the twenty-four years no less than 131 observers have made returns. Of these the following have furnished records for twelve years or more.

| | No. of years | | No. of years |
|-----------------------------|-----------------|----------------------------|-----------------|
| Wm. L. Baily, Ardmore, Pa., | 23 | Mrs. K. R. Styer, Concord- | |
| H. Walker Hand, Cape May, | | ville, Pa., | 17 |
| N. J., | 23 | Rev. Alex. Patman, Fox- | |
| Anna A. Mickle, Moores- | | chase, Pa., | 16 |
| town, N. J. | 23 | Miss Emily R. Thomas, | |
| Otto Behr, Lopez, Pa. | 22 | Bryn Mawr, Pa., | 15 |
| Richard F. Miller, Brides- | | Miss Minnie V. Flynn, Bor- | |
| burg, Phila., | 22 | dentown, N. J., | 15 |
| John D. Carter, Lansdowne | | M. Albert Linton, Moores- | |
| Pa., | 21 | town, N. J., | 15 |
| W. W. Fair, Downstown, | | Julian K. Potter, Camden, | |
| N. J., | 21 | N. J., | 14 |
| Wm. J. Serrill, Haverford | | Mrs. Victor Wiremann, | |
| Pa., | 19 | Moorestown, N. J., | 13 |
| Saml. C. Palmer, Swarth- | | Isaac G. Roberts, West | |
| more, Pa., | 19 | Chester, Pa., | 12 |
| Mrs. Alice K. Prince, Vine- | | Mrs. Norma F. Cromie, | |
| land, N. J., | 18 | Atlantic City, N. J., | 12 |

It is doubtful whether any such series of migration record has been kept elsewhere for a limited area. Heretofore tables have been

published each year in CASSINIA, showing the date of first arrival for all the species on our schedule at the stations within the Philadelphia ten-mile radius and for a part of the species at localities farther distant. Study, however, has shown that variation within an area of say twenty miles is more a matter of time devoted to observation and of local conditions than actual progress of migration, and the "first arrival" may just as well be recorded from the most northern station in such an area as from the most southern. The date of "general arrival" in our district, as computed for many years past, is the really important date resulting from the Club's records, and from it comparisons may be made between different years or between this and other regions when similar dates of "general arrival" are computed.

The dates for the numerous individual localities, while absolutely essential for computing the date of "general arrival," are not in themselves of sufficient importance to warrant the expense involved in their publication.

In view of these facts we propose in the future to publish, in one table, the earliest arrival of each species at any station within the Philadelphia ten-mile radius, and the date of "general arrival" for this area; with the addition of all notes on rare species or unusual occurrences as submitted by the entire migration corps. The original return schedules will be kept on file at the Academy of Natural Sciences and are available for study so that special reports may be compiled from them in the future.

We trust that our observers will continue their observations, and make returns as heretofore, and enlist others in the work so that the D. V. O. C. migration record will continue to hold its enviable position.

Date of First Arrival and General Arrival (*i. e.* at half the stations or more), within the Philadelphia Ten Mile Radius for the years 1922, 1923 and 1924.

| | 1922 | | 1923 | | 1924 | |
|------------------------|------------|-----------------|------------|-----------------|------------|-----------------|
| | First seen | General arrival | First seen | General arrival | First seen | General arrival |
| Canada Goose..... | Feb. 23 | | Mar. 4 | | Mar. 6 | |
| Green Heron..... | Apr. 12 | Apr. 30 | Apr. 21 | Apr. 22 | Apr. 27 | May 4 |
| Night Heron..... | Apr. 20 | Apr. 29 | Apr. 19 | Apr. 21 | Apr. 25 | May 4 |
| Spotted Sandpiper.. | Apr. 16 | Apr. 29 | Apr. 22 | Apr. 30 | May 2 | May 4 |
| Solitary Sandpiper.. | May 1 | May 7 | | | May 2 | May 3 |
| Killdeer..... | Feb. 20 | Feb. 26 | Feb. 22 | Mar. 2 | Mar. 1 | Mar. 14 |
| Dove..... | Feb. 18 | Mar. 10 | Feb. 13 | Mar. 4 | Mar. 9 | Mar. 18 |
| Osprey..... | Mar. 12 | Apr. 18 | Apr. 8 | Apr. 8 | Mar. 29 | |
| Turkey Vulture..... | Mar. 12 | Mar. 26 | Mar. 3 | Mar. 20 | Feb. 16 | |
| Yellow-bill. Cuckoo.. | May 7 | May 13 | May 6 | May 11 | May 2 | May 4 |
| Black-bill. Cuckoo.. | May 10 | May 14 | | | May 4 | May 6 |
| Kingfisher..... | Mar. 9 | Mar. 25 | Mar. 21 | Apr. 1 | Mar. 18 | Mar. 30 |
| Yel. Bel'd Sapsucker.. | Apr. 5 | | Feb. 18 | Apr. 16 | Mar. 30 | Apr. 13 |
| Red-head. Woodprk.. | May 7 | May 10 | Apr. 30 | May 18 | May 10 | May 13 |
| Flicker..... | Feb. 22 | Mar. 18 | Feb. 18 | Mar. 3 | Mar. 16 | Mar. 28 |
| Whip-poor-will..... | Apr. 13 | Apr. 16 | May 13 | | Apr. 27 | |
| Nighthawk..... | May 11 | May 14 | May 13 | May 14 | May 3 | |
| Chimney Swift..... | Apr. 13 | Apr. 21 | Apr. 13 | Apr. 21 | Apr. 19 | Apr. 24 |
| Hummingbird..... | May 7 | May 9 | Apr. 29 | May 8 | May 4 | May 10 |
| Kingbird..... | May 1 | May 7 | May 5 | May 11 | May 3 | May 7 |
| Crested Flycatcher.. | May 3 | May 7 | Apr. 28 | May 4 | May 2 | May 3 |
| Phoebe..... | Mar. 11 | Mar. 25 | Mar. 16 | Mar. 23 | Mar. 9 | Mar. 30 |
| Wood Pewee..... | May 7 | May 18 | May 13 | May 20 | May 3 | May 14 |
| Acadian Flycatcher.. | May 11 | May 14 | Apr. 29 | | May 8 | May 13 |
| Least Flycatcher.... | Apr. 29 | May 6 | May 13 | | Apr. 27 | |
| Bobolink..... | May 1 | May 8 | May 4 | May 13 | May 4 | May 7 |
| Cowbird..... | Mar. 2 | Mar. 25 | Mar. 24 | Mar. 27 | Mar. 4 | Mar. 30 |
| Red-wing. Blackbird.. | Feb. 22 | Mar. 2 | Feb. 26 | Mar. 4 | Mar. 4 | Mar. 9 |
| Meadow Lark..... | Feb. 19 | Feb. 25 | Mar. 4 | Mar. 13 | Mar. 1 | Mar. 3 |
| Orchard Oriole..... | May 4 | May 7 | May 4 | May 5 | May 5 | May 10 |
| Baltimore Oriole.... | May 1 | May 7 | May 5 | May 5 | May 3 | May 6 |
| Rusty Blackbird..... | Feb. 26 | | Mar. 11 | Mar. 17 | Mar. 10 | Mar. 30 |
| Purple Grackle..... | Feb. 19 | Feb. 22 | Feb. 21 | Mar. 2 | Feb. 23 | Mar. 1 |
| Vesper Sparrow..... | Mar. 26 | Apr. 3 | Mar. 24 | Apr. 8 | Mar. 12 | Apr. 5 |
| Savannah Sparrow.. | Mar. 25 | | Mar. 18 | | Mar. 30 | |
| Grasshopper Sparrow. | Apr. 21 | May 6 | Apr. 28 | May 6 | Apr. 29 | May 2 |
| Chipping Sparrow.... | Mar. 25 | Apr. 6 | Apr. 2 | Apr. 11 | Apr. 8 | Apr. 13 |
| Field Sparrow..... | Mar. 12 | Mar. 25 | Mar. 3 | Mar. 21 | Mar. 1 | Mar. 18 |
| Swamp Sparrow..... | Apr. 9 | Apr. 16 | Apr. 12 | Apr. 28 | Mar. 23 | |
| Fox Sparrow..... | Feb. 23 | Feb. 26 | Feb. 3 | Mar. 11 | Mar. 4 | Mar. 20 |
| Chewink..... | Apr. 9 | Apr. 19 | Mar. 18 | Apr. 21 | Apr. 12 | Apr. 22 |
| Rose-br. Grosbeak... | May 6 | May 10 | May 5 | May 12 | May 3 | May 7 |
| Indigo bird..... | May 6 | May 8 | May 1 | May 13 | May 4 | May 9 |
| Scarlet Tanager..... | May 4 | May 9 | May 2 | May 5 | May 3 | May 6 |
| Purple Martin..... | Apr. 11 | Apr. 16 | Apr. 6 | Apr. 8 | Apr. 5 | Apr. 12 |
| Cliff Swallow..... | May 13 | | | | | |

| | 1922 | | 1923 | | 1924 | |
|---------------------------------|------------|-----------------|------------|-----------------|------------|-----------------|
| | First seen | General arrival | First seen | General arrival | First seen | General arrival |
| Barn Swallow | Apr. 15 | Apr. 18 | Apr. 17 | Apr. 28 | Apr. 13 | Apr. 19 |
| Tree Swallow | Apr. 17 | Apr. 26 | Apr. 26 | Apr. 28 | Apr. 12 | Apr. 19 |
| Bank Swallow | Apr. 30 | May 8 | Apr. 21 | Apr. 29 | May 4 | May 12 |
| Rough-wg. Swallow | Apr. 21 | May 7 | Apr. 21 | Apr. 28 | Apr. 25 | May 4 |
| Cedar Bird | Mar. 15 | | Mar. 10 | | Mar. 3 | |
| Red-eyed Vireo | May 4 | May 7 | May 4 | May 6 | May 3 | May 4 |
| Warbling Vireo | May 1 | May 6 | May 9 | May 15 | May 5 | May 14 |
| Yellow-thr't Vireo | May 1 | May 9 | May 5 | May 5 | May 3 | May 9 |
| Solitary Vireo | Apr. 20 | Apr. 24 | Apr. 21 | Apr. 21 | Apr. 21 | Apr. 26 |
| White-eyed Vireo | Apr. 25 | May 4 | Apr. 28 | May 5 | Apr. 26 | May 4 |
| Blk. & wht. Warbler | Apr. 22 | Apr. 30 | Apr. 21 | Apr. 28 | Apr. 21 | Apr. 25 |
| Worm-eating W'blr | May 3 | May 7 | May 12 | May 13 | May 3 | May 3 |
| Blue-wing Warbler | May 5 | May 6 | May 4 | May 2 | May 2 | May 3 |
| Parula Warbler | May 3 | May 6 | May 5 | May 5 | May 3 | May 6 |
| Yellow Warbler | Apr. 22 | Apr. 30 | Apr. 28 | Apr. 29 | Apr. 27 | Apr. 29 |
| Blk. th't. Blue W'blr | May 1 | May 7 | May 3 | May 5 | Apr. 20 | May 3 |
| Myrtle Warbler | Mar. 30 | Apr. 12 | Mar. 18 | Apr. 21 | Mar. 29 | Apr. 23 |
| Magnolia Warbler | May 7 | May 7 | May 5 | May 12 | May 4 | May 13 |
| Chest.-sided W'blr | May 4 | May 7 | May 4 | May 5 | May 3 | May 4 |
| Black-poll Warbler | May 6 | May 10 | May 4 | May 6 | May 6 | May 14 |
| Blackburnian W'blr | May 9 | May 9 | May 5 | May 13 | Apr. 30 | May 12 |
| Blk.-th't. gr. W'blr | Apr. 27 | Apr. 30 | Apr. 27 | May 1 | Apr. 26 | May 1 |
| Pine Warbler | Apr. 29 | | Apr. 17 | | Apr. 13 | |
| Yellow Palm W'blr | Apr. 4 | Apr. 10 | Apr. 10 | Apr. 15 | Mar. 30 | Apr. 20 |
| Prairie Warbler | | | May 3 | May 3 | May 1 | May 3 |
| Oven-bird | Apr. 29 | Apr. 30 | Apr. 27 | Apr. 29 | Apr. 26 | May 3 |
| Water Thrush | May 3 | May 6 | Apr. 21 | May 4 | Apr. 26 | May 6 |
| Kentucky Warbler | May 6 | May 7 | May 6 | May 8 | May 3 | May 4 |
| Maryl'd Yellowthroat | Apr. 16 | Apr. 22 | Apr. 22 | Apr. 28 | Apr. 22 | Apr. 24 |
| Chat | May 5 | May 7 | May 5 | May 8 | May 4 | May 10 |
| Canada Warbler | May 7 | May 10 | May 13 | May 13 | May 4 | May 6 |
| Redstart | Apr. 28 | May 7 | May 2 | May 5 | Apr. 30 | May 3 |
| Catbird | Apr. 23 | May 2 | Apr. 28 | Apr. 29 | Apr. 26 | May 1 |
| Brown Thrasher | Apr. 4 | Apr. 13 | Apr. 21 | Apr. 24 | Apr. 21 | Apr. 22 |
| House Wren | Apr. 16 | Apr. 20 | Apr. 13 | Apr. 22 | Apr. 25 | Apr. 26 |
| Lg.-bill Marsh Wren | May 7 | | May 21 | | May 12 | |
| Ruby-cr'n. Kinglet | Apr. 2 | Apr. 8 | Apr. 7 | Apr. 15 | Apr. 11 | Apr. 16 |
| Wood Thrush | Apr. 28 | May 3 | Apr. 29 | May 1 | Apr. 24 | Apr. 30 |
| Wilson's Thrush | May 4 | May 10 | May 4 | May 11 | Apr. 28 | May 6 |
| Gray-check. Thrush | May 9 | May 12 | May 17 | May 20 | May 3 | |
| Olive-back Thrush | May 8 | May 10 | May 10 | May 13 | May 4 | May 5 |
| Hermit Thrush | Apr. 2 | Apr. 6 | Apr. 2 | Apr. 11 | Apr. 5 | Apr. 11 |
| Robin | Feb. 10 | Feb. 21 | Feb. 3 | Feb. 26 | Feb. 26 | Mar. 3 |
| Bluebird | Feb. 20 | Feb. 26 | Feb. 22 | Mar. 3 | Feb. 23 | Mar. 6 |

*List of Other Species Reported during 1922, and
Additional Notes on Species Contained in the Schedule*

*Autumn Dates Refer to Autumn of 1921
Unless Otherwise Stated.*

Horned Grebe, *Colymbus auritus*. Fish House, N. J., April 19 (4) (Potter); Reading, April 4 (3), 14 (2) (Poole); Westtown, April 15 (Carter).

Pied-billed Grebe, *Podilymbus podiceps*. Mt. Holly, N. J., June 26, 1921 (Pumyea); Fish House, N. J., April 22 (Potter); Hog Island, April 16 (Miller); Concordville, October 11 (Styer); Reading, October 1 and 16 and April 22-23 (Poole).

Loon, *Gavia immer*. Fish House, N. J., April 19-22 (2) (Potter); Mt. Holly, N. J., May 14, passing overhead (Pumyea); Five-mile Beach, N. J., June 17 and Island Beach, N. J., July 2 (Miller); Reading, April 22 to 23 when it was killed (Poole).

Red-throated Loon, *Gavia stellata*. Corson's Inlet, N. J., April 9, flock of 20 scattered (Potter).

Razor-billed Auk, *Alca torda*. Cape May, N. J., March 11 found dead (Hand); Beach Haven, March 13 found dead (Stone).

Dovekie, *Alle alle*. Beach Haven, N. J., December 30, 1921, found dead (McCadden); Corson's Inlet, N. J., December, 1921, found dead (Huber).

Herring Gull, *Larus argentatus*. Delaware River, September 26-March 26 (Gillespie); Frankford, Phila., October 2-April 23 (Miller); Wayne, March 23, five flying overhead (Alexander); Two-mile Beach, N. J., June 17 and Island Beach, N. J., July 2, common (Miller).

Laughing Gull, *Larus atricilla*. Atlantic City, N. J., May 8 (Cromie); Camden, N. J., appeared on the Delaware River September 9 and present until November 10 (Potter); Stone Harbor, N. J., the high tide of May 28 destroyed nearly all of the nests (Miller).

Bonaparte's Gull, *Larus philadelphia*. Delaware River below Philadelphia, April 16 and 22, common (Miller); at Camden, N. J., April 27 (500) and last seen May 11 (5) (Potter).

Kittiwake, *Rissa t. tridactyla*. Beach Haven, N. J., found dead February, 1921 (S. N. Rhoads).

Common Tern, *Sterna hirundo*. Atlantic City, N. J., May 5 (Cromie); Cape May, N. J., June 11, flock of 200 on the beach (Potter); Stone Harbor, N. J., June 25, breeding colony of 60 pairs (Miller); Delaware River below Philadelphia, April 16-22, common (Miller).

Black Tern, *Chlidonias surinamensis nigra*. Richmond, Phila., May 7, an adult and a number of immatures late in August (Miller).

Black Skimmer, *Rynchops nigra*. Stone Harbor, N. J., June 25, two nests with eggs (Miller).

Merganser, *Mergus americanus*. Fish House, N. J., February 26-April 22 (Potter); Mt. Holly, N. J., February 12-25 (Pumyea); Tulpehocken Creek, Reading, February 4, and common for some time after (Poole).

Hooded Merganser, *Lophodytes cucullatus*. Wolmsdorf, Berks Co., seven pair March 25; Reading, April 26 (1) (Poole); Norristown, March 18 (C. Roland).

Mallard, *Anas platyrhynchos*. Wolmsdorf, Berks Co., March 25 (2) (Poole); Sea Isle City, N. J., February 5 (2) (Potter).

Black Duck, *Anas rubripes tristis*. Sea Isle City, N. J., December 4, 1921, 1500-2000 just beyond the surf (Potter); Bridesburg, February 26, common (Miller); Dauberville, Berks Co., March 12 and Wolmsdorf, March 25 (16) (Poole).

Pintail, *Dafila acuta*. Mt. Holly, N. J., March 12 and 16 (Pumyea); Bridesburg, February 26 (Miller); Fish House, N. J., April 29 (Potter).

Baldpate, *Mareca americana*. Reading, March 31 (3) (Poole).

Lesser Scaup, *Marila affinis*. Reading, February 26 (Poole).

Greater Scaup, *Marila marila*. Reading, April 1, 4, 7 (Poole).

Goldeneye, *Glaucionetta c. americana*. Reading, February 26, April 4, 14, May 15 (Poole).

Buffle-head, *Charitonetta albeola*. Fish House, N. J., March 18 (Potter), Erma, Cape May Co., N. J., June 19 (Hand); Reading, April 4 (5) (Poole).

Old-squaw, *Clangula hyemalis*. Reading, April 1 and 23 (Poole).

Ruddy Duck, *Erismatura jamaicensis*. Reading, April 4 (3) 7 (1) (Poole).

Wood Duck, *Aix sponsa*. Mt. Holly, N. J., March 11 and 25, 1921 and April 1 to May 14, 1922, nesting nearby (Pumyea).

Canada Goose, *Branta canadensis canadensis*. Cape May, N. J., February 10, three flocks (Hand); Gibraltar, Berks Co., November 13 (54) (Poole).

Whistling Swan, *Olor columbianus*. Fish House, N. J., March 6 (2) (Baird).

Wood Ibis, *Mycteria americana*. Wernersville, Berks Co.; November 10, 1921, one shot and examined in the flesh (Poole).

Great Blue Heron, *Ardea h. herodias*. Salem Co., N. J., about their nesting place, February 25 (Carter); Mt. Holly, N. J. November 20, (Pumyea), Wolmsdorf, Berks Co., April 2 (Poole) Lopez, April 9 (Behr).

Egret, *Casmerodius egretta*. Mt. Holly, N. J., August 1922 (Pumyea) Newtown, August 4, 1922 (Packer).

Black-crowned Night Heron, *Nycticorax n. naevius*. Marshalltown, March 13, two in the heronry (Miller); Cape May, N. J., December 24 and January 30 (Hand).

Yellow-crowned Night Heron, *Nyctinassa violacea*. Glenolden, May 16 (Gillespie). [See Auk.]

Least Bittern, *Ixobrychus exilis*. Fish House, N. J., April 29 and May 5, nest with young just hatched May 27 (Potter); Moslem, Berks Co., May 20 (Poole).

Bittern, *Botaurus lentiginosus*. Reading, May 6, and Greenawalt, May 7 (Poole).

King Rail, *Rallus elegans*. Pennsgrove, N. J., April 16 and common on the Delaware marshes at Richmond and Bridesburg, June 3, nest and 10 eggs (Miller).

Sora, *Porzana carolina*. Greenawalt, Berks Co., May 13, Moslem, May 30, carrying nest material (Poole).

Florida Gallinule, *Gallinula galeata*. Still common on the Delaware marshes at Richmond, May 29, three nests with 9, 9, and 12 eggs, July 22 nest with 10 eggs (Miller).

Coot, *Fulica americana*. Reading, October 15 and 16, and at Charming Forge, April 29 (Poole).

Woodcock, *Philohela minor*. Cape May, N. J., a flight March 12, and old bird with three young at Green Creek, N. J., June 18 (Hand); Mt. Holly, N. J., April 7 and April 14, a nest and four eggs (Pumyea); Merchantville, N. J., April 12 (Potter); Pennsville, N. J., April 16, young just hatched (Miller). Ardmore,

June 17 (Baily); Haverford, March 18 (Serrill); Torresdale, October 28 and April 30 (Richardson); Reading, November 5 and March 12-29 (Poole); Lopez May 2, nest and four eggs, hatched three and young left May 18 (Behr).

Wilson's Snipe, *Gallinula delicata*. Some all winter at Cape May, N. J., increase March 26 and April 19 (Hand), Mt. Holly, N. J., April 5; also March 18 and 25, 1921 (Pumyea). Gwynedd, May 5 (Miller); Greenawalt, Berks Co., May 7, and Reading, October 1, December 9, January 7, March 8 (5), 19 (5), 22 (10) (Poole).

Knot, *Calidris canutus*. Stone Harbor, N. J., June 18 (2) (Potter).

Pectoral Sandpiper, *Pisobia maculata*. Reading, October 14 (Poole); Richmond, May 7 and 21 (Miller).

Least Sandpiper, *Pisobia minutilla*, Cape May, N. J., May 5 (Hand); Atlantic City, N. J.; May 21 (Cromie); Camden, N. J., May 21 (Potter); Stone Harbor, N. J., June 18 (Potter).

Red-backed Sandpiper, *Pelidna alpina sakhalina*. Corson's Inlet, N. J., December 4 (80), February 5 (50) and March 12 (50) (Potter).

Greater Yellow-legs, *Totanus melanoleucus*. Cape May, N. J., March 28 (Hand); Concordville, May 13 (Styer).

Hudsonian Curlew, *Numenius hudsonicus*. Cape May, N. J.; April 23 (Hand).

Willet, *Catoptrophorus s. semipalmatus*. Stone Harbor, May 21 and Island Beach, N. J., July 2, flock of 6 (Miller).

Upland Plover, *Bartramia longicauda*. Newtown (Packer); Eckville, Berks Co., June 26 and Fleetwood, Berks Co. May 20, (Poole); Gwynedd, April 27 (Miller); Greencastle, April 16, young on June 19 (Ziegler).

Black-breasted Plover, *Squatarola squatarola*. Cape May, N. J., May 5 (Hand); Corson's Inlet, N. J., December 4 (10) (Potter).

Sanderling, *Crocethia alba*. Reading, September 11 (Poole).

Semi-palmated Plover, *Charadrius semipalmatus*. Cape May, N. J., May 5 (Hand); Atlantic City, N. J., May 21 (Cromie); Camden, N. J., May 21, and Stone Harbor, N. J., June 18 (Potter); Reading, April 7 (Poole).

Piping Plover, *Charadrius melodus*. Ventnor, N. J., March 19 (5) and Sea Isle, N. J., April 9 (25) (Potter).

Killdeer, *Oxyechus vociferus*. Cape May, N. J., young hatched April 27 (Hand); Pennsgrove, N. J., April 16, hatching (Miller); Buckshutem, N. J., May 6, with three young (Prince).

Golden Plover, *Pluvialis dominicus*. Corson's Inlet, N. J., female shot November 23, 1922 (Huber).

Turnstone, *Arenaria interpres*. Atlantic City, N. J., May 23 (Cromie); Sea Isle City, N. J., May 21 (Potter).

Dove, *Zenaidura macroura carolinensis*. Concordville, small flock wintered, May 4 young left nest (Styer); Ardmore, April 2, nest and eggs (Baily); West Chester, some wintered (Brinton); Chestnut Hill, December 25, 1922, (4) (Trotter); North Wales, January 16, and Holmesburg, February 27 (26) (Miller); Mt. Holly, N. J., January 7 (7) (Pumyea).

Ruffed Grouse, *Bonasa u. umbellus*. Eckville, Berks Co., June 9, with young (Poole).

Ring-necked Pheasant, *Phasianus colchicus*. Rahway, N. J., nest and 12 eggs under bush in open woods not near water (Carter); Wernersville, Berks Co., October 7 (Poole).

Marsh Hawk, *Circus hudsonius*. Frankford, September 3–April 18, occasional (Miller); Reading, November 13–April 30 (Poole).

Cooper's Hawk, *Accipiter cooperi*. Reading, April 29, nest (Poole).

Red-tailed Hawk, *Buteo b. borealis*. Frankford, October 29–April 12 (Miller); Reading, September 24–April 3 (Poole).

Red-shouldered Hawk, *Buteo b. lineatus*. Reading, uncommon, October 7–April 23 (Poole).

Rough-legged Hawk, *Archibuteo l. sancti-johannis*. Jordantown, January 6 (Miller).

Sparrow Hawk, *Falco s. sparverius*. Glenolden, none till March 6 (Gillespie); Lansdowne, April 16, nest and eggs (Carter).

Bald Eagle, *Haliaeetus leucocephalus*. New Tripoli, Lehigh Co., September 5, immature bird (Poole).

Golden Eagle, *Aquila chrysaetos*. Brown's Mills, N. J., shot December 1921 (Pumyea)

Barn Owl, *Tyto pratincola*. National Park, N. J., three wintered 1921–2 (Potter); Sinking Springs, Berks Co., June 16, nest, and State Hill, May 21 (Poole).

Short-eared Owl, *Asio flammeus*. Newtown, one shot February 1 (Packer); Norristown, January 17 (C. Roland)

Long-eared Owl, *Asio wilsonianus*. West Chester, five in a nursery for some time, February 21 (Roberts).

Great Horned Owl, *Bubo v. virginianus*. Albany Twp., Berks Co., September 1 (Poole).

Saw-whet Owl, *Cryptoglaux acadica*. Holmesburg, April 5 (Miller); Mountain, Berks Co., April 30 (Poole); National Park, N. J., January 15 (Potter).

Belted Kingfisher, *Ceryle a. alcyon*. Haddonfield, N. J., January 15 (S. N. Rhoads); Ambler, January 20, (Gillen).

Red-headed Woodpecker, *Melanerpes erythrocephalus*. Mt. Holly, N. J., June 16, 1921 (Pumyea).

Yellow-bellied Sapsucker, *Sphyrapicus v. varius*. West Chester, October 18, (Roberts).

Flicker, *Colaptes auratus luteus*. North Wales, February 1; Frankford, February 5, 10, 25; Foxchase, February 11 (Miller).

Pileated Woodpecker, *Ceophloeus pileatus abieticola*. Eckville, Berks Co., on the Blue Ridge, May 28, one seen to good advantage (Poole).

Ruby-throated Hummingbird, *Archilochus colubris*. Concordville, June 30, young flew from the nest (Styer).

Yellow-bellied Flycatcher, *Empidonax flaviventris*. Mount Holly, N. J., May 13 (Pumyea); Vineland, N. J., August 27, 1921 (Prince); Hamburg, Berks Co., May 13-14 (Poole); Ardmore, May 10 (Baily).

Phoebe, *Sayornis phoebe*. West Vincent, Chester Co., April 18, nest and one egg; April 22, five eggs; May 9, all hatched; May 25, all left the nest and June 4, one egg of a second set (Lloyd).

Horned Lark, *Otocoris alpestris alpestris*. Haverford, January 14 (25) (Serrill); Reading, October 29-January 15, scarce (Poole) Newtown, January 11 (Packer); Greencastle, November 23-March 15 (Ziegler).

Blue Jay, *Cyanocitta cristata cristata*. Wayne, April 2, none wintered (Alexander); West Vincent, Chester Co., none till May 5 (Lloyd); West Chester, none till March 12 (Roberts); Berks Co., resident locally; nest and four eggs, Albany Twp., May 30 (Poole)

Starling, *Sturnus vulgaris*. Vineland, N. J., rapidly increasing, large flocks all winter (Prince); Greencastle, now common (Ziegler).

Bobolink, *Dolichonyx oryzivorus*. Gwynedd, June 7, nest and five eggs (Miller).

Evening Grosbeak, *Hesperiphona v. vespertina*. Vineland, N. J., not seen for two years, a flock arrived January 5 and was seen till March 18 (12-40) (Prince); Mt. Holly, N. J., November 20, one bird (Pumyea and Potter); Moorestown, N. J., April 21, 25, 27 (Linton and Jacob); Lopez, October 12, 1921 (Behr).

Pine Grosbeak, *Pinicola enucleator leucura*. Reading, January 24 (8); February 3 (2), 6 (80), 13 (9), March 3 (2) (Poole); Olney, Phila., January 29 (Stone).

Purple Finch, *Carpodacus p. purpureus*. Moorestown, N. J., April 3-May 1 (Mickle); Frankford, October 16 (Miller); Holmesburg, January 7, February 19 and 24 (Miller); Swarthmore, April 22 (Palmer); Glenolden, October 23 (Gillespie); Concordville, April 11 (Styer); West Chester, April 30-May 12 (Roberts); Reading, September 22-May 6 (Poole).

Pine Siskin, *Spinus pinus*. West Chester, April 5 (Sharples); February 21-April 16 (Roberts); Reading, October 8, May 2-5 (Poole); Gwynedd Valley, October 29 (Huber); Kennett, November 24 (Pennock).

Chaffinch, *Fringilla coelebs*. Concordville, December 23 to January 14 with Juncos, finally killed by a Hawk and feathers identified by Dr. Stone (Styer).

Henslow's Sparrow, *Passerherbulus henslowi*. Cape May, N. J., May 8 (Hand); New Lisbon, N. J., May 14 (Pumyea).

Savannah Sparrow, *Passerculus sandw. savanna*. West Chester, February 25, in small flocks more frequent than usual (Roberts).

Song Sparrow, *Melospiza m. melodia*. Holicong, April 28, nest and eggs, hatched May 19 (Cox).

Tree Sparrow, *Spizella m. monticola*. Vineland, N. J., to March 12 (Prince); Frankford, October 24 (Miller); Holicong, October 10-April 8 (Cox); West Chester, to February 25 (Roberts); Greencastle, January 1-March 1 (Ziegler); Reading, November 13-April 2 (Poole).

White-throated Sparrow, *Zonotrichia albicollis*. Vineland, N. J., October 15-April 29 (Prince); Mt. Holly, N. J., October 6-May 17 (Pumyea); Moorestown, N. J., October 24-May 13 (Mickle); Swarthmore, to May 12 (Keighton); Wayne, April 30 (Alexander);

Glenolden, September 24–May 13 (Gillespie); Concordville, September 24–May 7 (Styer); Frankford, September 19–May 15 (Miller); Holicong, November 3–December 8 and May 2–30 (Cox); Reading, September 18–May 13 (Poole); Greencastle, March 26–May 1, none wintered (Ziegler).

White-crowned Sparrow, *Zonotrichia l. leucophrys*. Greenawalt, Berks Co., October 15 (2), October 22 and 26, May 7 and 13 (4) (Poole); Holicong, May 21 (Cox); Greencastle, May 7–11 (Ziegler); Lopez, May 7 (Behr).

Junco, *Junco h. hyemalis*. Vineland, N. J., October 20–March 25 (Prince); Downstown, N. J., October 26–April 29 (Fair); Mt. Holly, N. J., October 9–April 16 (Pumyea); Moorestown, N. J., October 6–May 3 (Mickle); Glenolden, October 5–April 23 (Gillespie); Concordville, October 1–April 30 (Styer); West Chester, October 18–April 30 (Roberts); Swarthmore, to April 30 (Keighton); Frankford, October 11–April 30 (Miller); Holicong, September 23–May 3 (Cox); Reading, September 24–April 30 (Poole); Pocono Lake, June 3 nest and 4 eggs not hatched by June 7 (Carter); Greencastle, October 28 (Ziegler).

Towhee, *Pipilo e. erythrophthalmus*. Newtown, July 9, nest and three eggs (Packer).

Fox Sparrow, *Passerella i. iliaca*. Vineland, N. J., December 2 (Prince).

Rose-breasted Grosbeak, *Zamelodia ludoviciana*. Holmesburg N. J., June 22, 1922 (Pennock).

Cardinal, *Cardinalis c. cardinalis*. West Vincent, Chester Co., several resident (Lloyd); Holicong, two seen (Cox); Greencastle, common resident (Ziegler).

Cliff Swallow, *Petrochelidon l. lunifrons*. Eckville, Berks Co., June 5 and 9, large colonies also June 26; Greenawalt, arrived April 14, prepared to nest May 13; Gibraltar, nesting May 24 (Poole).

Tree Swallow, *Iridoprocne bicolor*. Cape May, N. J., September 25–26, 3000 or 4000 on the golf links in an hour-glass shaped group 100 feet wide at end and 300 feet long (Hand).

Cedar Waxwing, *Bombycilla cedrorum*. Greencastle, May 28–June 9 (Ziegler); Concordville, young left the nest July 9 (Styer).

Northern Shrike, *Lanius borealis*. Cape May, N. J., common

winter of 1921-22 (Hand); Beverly, N. J., January 8 (Street); Mt. Holly, N. J., December 26-January 8 (Pumyea); Moorestown, N. J., December 25 and January 22 (Mickle); Concordville, January 1 (Styer); Swarthmore, December 15 (Palmer); Lansdowne, March 21 (Roberts); Merion, February 4, and Malvern February 3 (Beatty); Reading, November 6-March 29, frequent (Poole); Gwynedd, January 20 and March 15 (Miller).

Migrant Shrike, *Lanius ludovicianus migrans*. Gibraltar, Berks Co., November 13 (Poole); Newtown, April 7 (Packer); Oreland, April 8 (Miller).

Golden-winged Warbler, *Vermivora chrysoptera*. Mt. Holly, N. J., May 14 and 15 (Pumyea); Merion, May 14 (Beatty); Albany Twp., Berks Co., June 26 and August 19, 1921 (Poole); Reading, May 5 and 6 (Poole).

Nashville Warbler, *Vermivora r. ruficapilla*. Merion, May 2 and 14 (Beatty); Ardmore, May 9 (Baily); West Chester, May 12 (Roberts); Pocono Lake, June 4, nest and five eggs (Carter).

Tennessee Warbler, *Vermivora peregrina*. Swarthmore, May 11 (Palmer); Lansdowne May 12 (Carter); Concordville, May 11 (Styer); West Chester, May 10 (Roberts); Ardmore, May 13 (Baily); Greenawalt, Berks Co., May 13 and Reading, August 26, 1921 (Poole).

Cape May Warbler, *Dendroica tigrina*. West Chester, May 9 (Roberts); Merion, May 15 (Beatty); Oaks, May 13 (Baily); Greenawalt, May 7 (Poole).

Magnolia Warbler, *Dendroica magnolia*. Pocono Lake, June 7, nest and three eggs (Carter).

Blackburnian Warbler, *Dendroica fusca*. Pocono Lake, June 4, nest and four eggs (Carter).

Black-throated Green Warbler, *Dendroica virens*. Eckville, Berks Co., June 5, apparently nesting (Poole).

Bay-breasted Warbler, *Dendroica castanea*. Greencastle, May 14 (Ziegler); Greenawalt, Berks Co., May 7 (Poole).

Myrtle Warbler, *Dendroica coronata*. Reading, February 27, one with Bluebirds (Poole); Kennett Sq., November 25 (Pennock). Pocono Lake, June 5-7, at least two males in song (Carter).

Mourning Warbler, *Oporornis philadelphia*. Oaks, May 13 (Baily).

Connecticut Warbler, *Oporornis agilis*. Vineland, N. J., October 11 (Prince).

Water-Thrush, *Seiurus n. noveboracensis*. Pocono Lake, June 7, nest and two eggs (Carter).

Louisiana Water-Thrush, *Seiurus motacilla*. Haverford, April 15 (Serrill); Reading, April 23 (Poole).

Wilson's Warbler, *Wilsonia p. pusilla*. Oaks, May 13 (Baily); Haverford, May 14 (4) (Serrill); Concordville, May 12 (Styer).

Hooded Warbler, *Wilsonia citrina*. Cape May, N. J., May 8 (Hand); Mt. Holly, N. J., May 14 and 15 (Pumyea); Moorestown, N. J., May 10 (J. R. Lippincott); Greencastle, May 8 (Ziegler); Eckville, Berks Co., June 5, 9, 26, probably breeding, Greenawalt, May 7 and 13; White Bear, May 21 (Poole).

Redstart, *Setophaga ruticilla*. Vineland, N. J., June 10, feeding young (Prince).

Titlark, *Anthus rubescens*, Richmond, January 12 (Miller); Newtown, March 8 flock of 50 (Packer); Reading, February 26 (8) March 25 (30); April 12 (44); May 2 (50) (Poole).

Catbird, *Dumetella carolinensis*. Concordville, last seen October 21 (Styer); Cape May, N. J., December 16 (Hand).

Mockingbird, *Mimus p. polyglottos*. Mt. Holly, N. J., November 20 (Pumyea); Haverford, April 29 (Serrill); West Chester, one singing repeatedly on the Mellor place two miles west during June (Roberts).

Winter Wren, *Nannus h. hiemalis*. Vineland, N. J., October 23 (Prince); Mt. Holly, N. J., October 9–January 2 (Pumyea); Concordville, October 11–April 28 (Styer); Crescentville, February 10 (Miller); Fritz Island, Reading, September 24–April 23 (Poole); Greencastle, December 19 (Ziegler); Beverly, N. J., singing January 8 (Street).

Carolina Wren, *Thryothorus l. ludovicianus*. Fritz Island, Reading, October 26–January 22, one individual (Poole); Greencastle, March 26–April 29 (Ziegler).

Bewick's Wren, *Thryomanes b. bewicki*. Greencastle, April 7, arrived and probably nested (Ziegler).

Long-billed Marsh Wren, *Telmatodytes p. palustris*. Greenawalt, Berks Co., May 7, one watched for 15 minutes under exceptionally favorable circumstances (Poole).

Brown Creeper, *Certhia familiaris fusca*. Moorestown, N. J., September 20–March 2 (Mickle); Vineland, N. J., October 15 (Prince); Mt. Holly, N. J., October 9–February 25 (Pumyea); Glenolden, September 26–January 1 and April 30 (Gillespie); Swarthmore, all winter (Palmer); Frankford, September 19 (Miller); Reading, common September 22–April 15 (Poole); Greencastle, April 2 (Ziegler).

Red-breasted Nuthatch, *Sitta canadensis*. Concordville, September 10 (Styer); West Chester, January 2–May 12, about three (Roberts); Reading, August 26–May 4, in scrub pines on Mt. Penn (3–7) (Poole); Greenawalt, May 7 and 13 (Poole); Greencastle, common during the winter of 1921–22 (Ziegler).

Black-capped Chickadee, *Parus a. atricapillus*. Swarthmore, until April 19 (Palmer); Ringing Rocks, Berks Co., June 16, nest (Packer).

Tufted Titmouse, *Baeolophus bicolor*. Vineland, N. J., all winter (Prince); West Chester, March 9, only record (Roberts); Reading, scarce, only one colony in Berks Co. (Poole).

Blue-gray Gnatcatcher, *Poliophtila c. caerulea*. Greencastle, April 30, in apple bloom (Ziegler).

Golden-crowned Kinglet, *Regulus s. satrapa*. Vineland, N. J., October 20 (Prince); Glenolden, Mt. Holly, N. J., October 7–January 8 (Pumyea); Glenolden, October 9–April 10 (Gillespie); Concordville, September 24 (Styer); West Chester, to April 9 (Roberts); Frankford, September 27 (Miller); Swarthmore, to April 12 (Palmer); Reading, September 22–April 7, common (Poole); Greencastle, January 22 (Ziegler).

Veery, *Hylocichla f. fuscescens*. Water Gap, several pairs on the island apparently nesting (Roberts).

Robin, *Planesticus, m. migratorius*. Holicong, April 28, nest with eggs (Cox).

*List of Other Species Reported during 1923, and Additional
Notes on Species Contained in the Schedule. Autumn
Dates refer to the Autumn of 1922 unless
Otherwise Stated.*

Pied-billed Grebe, *Podilymbus podiceps*. Mt. Holly, N. J., April 7–8 (Pumyea); Northern Lancaster Co., nest and eggs June 6 (Herbert H. Beck).

Dovekie, *Alle alle*. March 18, found dead near Medford, N. J. (S. N. Rhoads).

Herring Gull, *Larus argentatus*. Stone Harbor, N. J., June 17 and 23 (100), Townsend's Inlet, N. J., June 17 (30); Brigantine Beach, N. J., June 24 (100); Gwynedd, March 28, four flew overhead (Miller); Glenolden, November 21–April 5 (Gillespie); Atlantic City, N. J., August 28–May 14 (Cromie); Swarthmore, March 3, two flew over (Palmer); Lansdowne, March 5 (Carter).

Laughing Gull, *Larus atricilla*. Atlantic City, N. J., April 23 (Cromie).

Bonaparte's Gull, *Larus philadelphia*. Chester, April 14 (5) April 22–24 (Miller).

Common Tern, *Sterna hirundo*. Delaware River below Philadelphia, April 22 (Miller).

Sooty Shearwater, *Puffinus griseus*. Stone Harbor, N. J., June 17, 1923, two found dead on the beach (Miller).

Double-crested Cormorant, *Phalacrocorax a. auritus*. Cape May, N. J., April 21 (Hand); Beverly, N. J., November 4 (D. G. Baird).

Merganser, *Mergus americanus*. Mt. Holly, N. J., April 7, three (Pumyea).

Black Duck, *Anas rubripes tristis*. Salem, N. J., May 6, five nests, with 9, 9, 9, 10, and 11 eggs (Miller); Mt. Holly, N. J., April 7 (Pumyea); Swarthmore, small flock flew over May 24 (Palmer).

Pintail, *Dafila acuta*. Burlington, N. J., April 8, three (Pumyea); Richmond, February 2, Tinicum, February 22 (Miller).

Wood Duck, *Aix sponsa*. Maurice River, N. J., September 23 (Prince).

Scaup, *Marila marila*. Buckshutem, N. J., April 7 (Prince); Burlington, N. J., April 8 (25) (Pumyea).

Lesser Scaup, *Marila affinis*. Bridesburg, December 3 (3) (Miller).

Goldeneye, Burlington, N. J., April 8 (Pumyea).

Bufflehead, *Charitonetta albeola*. Darby Creek, March 3 (Serrill).

Canada Goose, *Branta c. canadensis*. Cape May, N. J., March 10, many flocks (Hand); Malvern, January 4, flock of four roosted in a woods and two were shot by a farmer (Beatty).

Whistling Swan, *Olor columbianus*. Cape May, N. J., April 25, four flying past, off the jetty (Hand).

Great Blue Heron, *Ardea h. herodias*. Moorestown, N. J., April 21 (Mickle); Mt. Holly, N. J., April 7 (Pumyea); Pennsville, March 25 (Miller).

American Egret, *Casmerodius egretta*. Torresdale, September 16 (Gaede).

Bittern, *Botaurus lentiginosus*. Moorestown, N. J., May 27 (Linton); Mt. Holly, N. J., April 6 (Pumyea); Darlington, April 21 (Daley).

Wood Ibis, *Mycteria americana*. Cape May, N. J., four present July 7 to August 21, 1923 (Stone). [Auk, 1923, p. 692.]

Woodcock, *Philohela minor*. Cape May, N. J., flights on October 25-27, November 9 and March 5-11 (Hand); Haddonfield, N. J., February 4 (S. N. Rhoads); Frankford, March 4, Pennsgrove, N. J., April 24, nest and two eggs (Miller).

Wilson's Snipe, *Gallinago delicata*. Cape May, N. J., March 10 (Hand); Pennsgrove, N. J., March 25 (4) (Miller); Mt. Holly, N. J., April 8 and 10 (Pumyea).

Semipalmated Sandpiper, *Ereunetes pusillus*. Brigantine, N. J., June 24 (15) (Miller).

Greater Yellow-legs, *Totanus melanoleucus*. Cape May, N. J., April 8 (Hand); Moorestown, N. J., May 5 (Jacob); Haverford, May 6 (Serrill).

Lesser Yellow-legs, *Totanus flavipes*. Cape May, N. J., July 7, 1922 (Hand).

Willet, *Catoptrophorus s. semipalmatus*. Rio Grande, Cape May Co., N. J., May 20, one found dead; Stone Harbor, N. J., June 17 (6) and 23 (4) (Miller).

Upland Plover, *Bartramia longicauda*. Pennsville, April 8 (Miller).

Killdeer, *Oxyechus vociferus*. Buckshutem, N. J., April 7, nest and four eggs (Prince).

Semipalmated Plover, *Charadrius semipalmatus*. Cape May, N. J., April 24 (Hand); Stone Harbor, N. J., June 17 (13) (Miller).

Piping Plover, *Charadrius melodus*. Brigantine Beach, N. J., June 24, ten pairs, nest and four eggs (Miller).

Black-breasted Plover, *Squatarola squatarola*. Cape May, N. J., May 5 (Hand).

Turnstone, *Arenaria interpres*. Cape May, N. J., May 5 (Hand).
Ruffed Grouse, *Bonasa u. umbellus*. Cape May, N. J., January 10, flock of six in upper part of the county (Hand).

Mourning Dove, *Zenaidura macroura carolinensis*. Rahway, N. J., April 27, nest on the ground in a dry spot in a marsh (Carter); Concordville, April 12, young out of the nest (Styer); Paoli, February 12, fourteen (W. W. McCall); Gwynedd January 9 (3); Frankford, February 4 (4) (Miller).

Turkey Vulture, *Cathartes aura septentrionalis*. Pennsville, N. J., April 8, nest and two eggs in a deserted cabin in the woods (Miller).

Marsh Hawk, *Circus hudsonius*. Cape May, N. J., May 13, nest and two eggs (Miller); Lopez, arrived March 23 (Behr).

Cooper's Hawk, *Accipiter cooperi*. Bromall, April 21, nest (Carter); Gwynedd, December 1, 14, January 11, 12 and 26; Frankford, March 9 (Miller); Lopez, arrived April 17 (Behr).

Broad-winged Hawk, *Buteo platypterus*. Salem, N. J., May 30, nest and two eggs and Pennsville, N. J., April 8 (Miller).

Red-tailed Hawk, *Buteo b. borealis*. Anne Arundel Co., Md., April 1, two nests in the tops of lofty pines, one containing two nearly plain white eggs (Carter).

Rough-legged Hawk, *Archibuteo l. sancti-johannis*. Mt. Holly, N. J., February 12 (Pumyea); Tinicum, January 2 and 15 (2), February 22 (4), 25 (2), April 2 (3) (Miller); Darlington, February 7 (Daley).

Pigeon Hawk, *Falco columbarius*. West Chester, April 25, a female shot (Carter).

Sparrow Hawk, *Falco s. sparverius*. Lopez, arrived April 17 (Behr).

Bald Eagle, *Haliaeetus l. leucocephalus*. Gwynedd, April 25 (Miller).

Osprey, *Pandion h. carolinensis*. Salem, N. J.; March 25 (Miller) Buckshutem, N. J., March 5, at the old nest (Prince).

Barn Owl, *Tyto pratincola*. Tinicum, December 11, young found dead apparently about eight weeks old; February 25, nest and three eggs (Miller); April 28, nest and four eggs (Carter); Moorestown, N. J., May 18 (Mickle).

Short-eared Owl, *Asio flammeus*. Salem, N. J., May 6, four nestlings four to six weeks old (Miller).

Long-eared Owl, *Asio wilsonianus*. Germantown, January 22, Holmesburg, March 1 (3); Evansburg, March 10, colony of 25 in a cedar grove; Pennsgrove, N. J., April 22, nest and six eggs (Miller); Bromall, April 21, nest and four eggs (Carter).

Screech Owl, *Otus asio*. April 10, nest and four eggs (Carter).

Saw-whet Owl, *Cryptoglaux acadicus*. Germantown, January 25 (Emlen).

Belted Kingfisher, *Ceryle a. alcyon*. Lansdowne, February 10 (Carter).

Red-headed Woodpecker, *Melanerpes erythrocephalus*. Cape May, N. J., May 13, Ft. Washington, May 19, Gwynedd, May 24, Frankford, at least three pairs bred (Miller).

Yellow-bellied Sapsucker, *Sphyrapicus v. varius*. Pennsgrove, N. J., April 7; Frankford, December 9 (Miller).

Flicker, *Colaptes auratus luteus*. Frankford, December 9, 24, 31, January 1, 13, 20, 27, February 3 and 26; Holmesburg, December 4 (2), 25 (3), January 21; Gwynedd, December 1, 14, 22, January 23, 24; Bustleton, December 25 (3) (Miller).

Whip-poor-will, *Antrostomus v. vociferus*. Rio Grande, N. J., June 3, nest and two young in the down (Miller).

Phoebe, *Sayornis phoebe*. Holicong, till January 23, 1923 (Cox); Glenolden, March 17 (Carter); Glenmore, Chester Co., nest with one egg, April 21, five by April 25, hatched May 13 and a second brood hatched by June 21 (Lloyd).

Arkansas Kingbird, *Tyrannus verticalis*. Cape May, N. J., September 17 (Stone).

Horned Lark, *Otocoris a. alpestris*. Mt. Holly, N. J., February 12 (25) (Pumyea).

Raven, *Corvus corax principalis*. Tyrone, April 15, 1923, four young (Scoville).

Blue Jay, *Cyanocitta c. cristata*. West Chester, May 13, building in beech tree 40 feet from the ground; Folsom, Pa., nest and six eggs in oak 40 feet up (Carter).

Cowbird, *Molothrus a. ater*. Tinicum, February 22 (36); Gwynedd, December 1 (Miller).

Red-winged Blackbird, *Agelaius p. phoeniceus*. Cape May, N. J., flock of about 6000, reached a half mile (Hand).

Rusty Blackbird, *Euphagus carolinus*. Tinicum, December 11 (3) (Miller).

Purple Grackle, *Quiscalus q. quiscula*. White Marsh, January 16 (Miller); Glenolden, February 11 (Carter).

Bobolink, *Dolichonyx oryzivorus*. Buckshutem, N. J., August 29 (Prince); Chestnut Hill, April 28 (E. E. Wildmann).

Red Crossbill, *Loxia curvirostra minor*. Lumberton, N. J., January 21 (5); Smithville, N. J., February 7 (5); Hainesport, N. J., March 18 (2) (Pumyea); Ambler, January 15 (J. R. Gillen); Glenolden, February 25 and April 18 (Gillespie).

White-winged Crossbill, *Loxia leucoptera*. Lumberton, N. J., January 21, Smithville, N. J., February 7 (Pumyea).

Purple Finch, *Carpodacus p. purpureus*. Moorestown, N. J., May 4 (Mickle); Beverly, N. J., October 28- May 6 (D. G. Baird); Glenolden, October 29-May 3 (Gillespie); Darlington, January 25 (10) (Daley).

Pine Siskin, *Spinus pinus*. Moorestown, N. J., January 25 and February 13 (Mickle); Smithville, N. J., February 18 (10) (Pumyea); Concordville, present all winter, 50 on May 13, and last seen on May 19 (Styer); Fox Chase, January 29 (30) (Miller).

Goldfinch, *Astragalinus t. tristis*. Holmesburg, September 1, nest and five fresh eggs (Miller).

Vesper Sparrow, *Pooecetes g. gramineus*. Glenmore, nest and four eggs May 7 (Lloyd); Gwynedd, December 1, 1922 (Miller).

Henslow's Sparrow, *Passerherbulus henslowi*. Pennsgrove, N. J., April 22 (3) (Miller).

Swamp Sparrow, *Melospiza georgiana*. Tinicum, December 11 and April 2 (Miller).

Field Sparrow, *Spizella p. pusilla*. Bustleton, December 25 (2); January 24 (2) (Miller).

Tree Sparrow, *Spizella m. monticola*. Pennsville, N. J., April 8 (Miller); Holicong, October 30 (Cox).

White-throated Sparrow, *Zonotrichia albicollis*. Moorestown, N. J., October 5-May 13 (Mickle); Beverly, N. J., October 12-May 13 (D. B. Baird); Glenolden, September 24-May 24 (Gillespie); Swarthmore, May 16 (Palmer); Lansdowne, May 4 (Roberts); Concordville, to May 15 (Styer); Frankford, September 23 to May (Miller); Darlington, April 21-June 2 (Daley).

White-crowned Sparrow, *Zonotrichia l. leucophrys*. Holicong, May 13 (Cox); Concordville, May 13 (Styer).

Junco, *Junco h. hyemalis*. Moorestown, N. J., September 29–April 25 (Mickle); Beverly, N. J., October 15–April 22 (Baird); Glenolden, September 26–April 26 (Gillespie); Buckshutem, N. J., October 14–March 21 (Prince); Downstown, N. J., October 19–April 18 (Fair); Vineland, N. J., October 14–March 21 (Prince); Holicong, September 22 (Cox); Glenmore, Chester Co., October 10–May 29 (Lloyd). Frankford, October 2–April 30 (Miller).

Fox Sparrow, *Passerella i. iliaca*. Frankford, December 9–February 23, several wintered; Fairmount Park, Phila., February 8, Bustleton, December 18–January 21 (Miller).

Towhee, *Pipilo e. erythrophthalmus*. Vineland, N. J., February 3 (Prince); Pennsgrove, N. J., April 8 (Miller); Frankford, January 13 (Miller).

Cardinal, *Cardinalis c. cardinalis*. Glenmore, Chester Co., a pair wintered (Lloyd).

Blue Grosbeak, *Guiraca c. caerulea*. Cape May, N. J., November 11, a female (Potter).

Cliff Swallow, *Petrochelidon l. lunifrons*. Cape May, N. J., May 13 (10) (Miller).

Barn Swallow, *Hirundo erythrogastra*. Pennsgrove, N. J., April 7 (2) (Miller).

Tree Swallow, *Iridoprocne bicolor*. Cape May, N. J., large flocks of many thousands October 11 and 13 (Hand).

Purple Martin, *Progne subis*. Cape May, N. J., last seen September 17 (Hand); Limerick, April 15 (3) (Miller).

Pipit, *Anthus rubescens*. Tinicum, February 22 (18) (Miller); Glenolden, March 25 (Gillespie).

Northern Shrike, *Lanius borealis*. Downstown, N. J., January 28 (Fair).

Black and White Warbler, *Mniotilta varia*. Rio Grande, Cape May Co., N. J., June 3, nest and five young (Miller).

Nashville Warbler, *Vermivora r. ruficapilla*. Lansdowne, May 13 (Carter).

Tennessee Warbler, *Vermivora peregrina*. Haverford, May 20 (Serrill); Concordville May 23 (Styer).

Golden-winged Warbler, *Vermivora chrysoptera*. Holicong, May 6 (Cox); Concordville, May 5 and 6 (Styer); Haverford, May 6, a pair (Serrill).

Yellow Warbler, *Dendroica a. aestiva*. Pennsgrove, N. J., April 22 (Miller).

Bay-breasted Warbler, *Dendroica castanea*. Darlington, May 19 (Daley); Moorestown, N. J., and May 13 (Linton).

Cape May Warbler, *Dendroica tigrina*. Swarthmore, May 16-18 several (Palmer); Lansdowne May 13 (Carter); Concordville, May 17 (Styer).

Prairie Warbler, *Dendroica discolor*. Rio Grande, Cape May Co., May 27, nest and eggs (Miller).

Maryland Yellow-throat, *Geothlypis t. trichas*. Pennsgrove, N. J. April 23 (3) (Miller); Tulpehockin Creek, six miles west of Reading, December 18, 1920 (Poole).

Louisiana Water-Thrush, *Seiurus motacilla*. Wissahickon Creek, June 13, nest and young, (Wm. Jay).

Wilson's Warbler, *Wilsonia p. pusilla*. Haverford, May 13 (Serrill); Darlington, May 18 (Daley); Concordville, May 12 (Styer).

Hooded Warbler, *Wilsonia citrina*. Rio Grande, June 3, nest and two eggs (Miller); Merion, May 17 (Beatty); Moorestown, N. J., May 5, unusually abundant (Mickle).

Redstart, *Setophaga ruticilla*. Salem, May 30 (Miller).

Brown Thrasher, *Toxostoma rufum*. Glenolden, November 22-December 5 (Gillespie); Haverford, December 26 (Wm. W. McCall).

Catbird, *Dumetella carolinensis*. Cape May, N. J., December 9 (Hand); Merion, February 14-March 30 (Beatty).

Mockingbird, *Mimus p. polyglottos*. Vineland, N. J., April 28-29 (Prince); Salem, N. J., May 6 (Miller); Cape May, N. J., May 13 (Miller); Darlington, April 26, only record in 5 years (Daley).

Winter Wren, *Nannus h. hiemalis*. Vineland, N. J., October 13 (Prince); Moorestown, N. J., September 28 (Mickle); Glenolden, October 13-April 3 (Gillespie); Merion, April 15 (Beatty); Holicong October 3 (Cox); Concordville, to May 2 (Styer); Frankford, September 25 (Miller).

Short-billed Marsh Wren, *Cistothorus stellaris*. Salem, May 6 (2) (Miller).

Brown Creeper, *Certhia familiaris americana*. Moorestown, N. J.

October 6 to January 1 (Mickle); Beverly, N. J., October 15–April 6 (Baird); Glenolden, October 15–April 6 but none in mid-winter (Gillespie); Darlington, January 5–May 24 (Daley); Swarthmore, April 2 (Palmer); Holicong, October 10 (Cox); Frankford, October 2 (Miller); Pocono Lake, feeding full grown young, May 23 (Carter).

Red-breasted Nuthatch, *Sitta canadensis*. Mt. Holly, N. J., December 25 (Pumyea).

White-breasted Nuthatch, *Sitta c. carolinensis*. Beverly, N. J., October 4–March 11, very few (Baird); Bustleton, April 28, six young hatched and two infertile eggs (Miller).

Golden-crowned Kinglet, *Regulus s. satrapa*. Moorestown, N. J., September 28 (Mickle); Beverly, N. J., to April 21 (Baird); Glenolden, October 9–April 12 (Gillespie); Holicong, November 10 (Cox); Frankford, September 25–April 21 (Miller); Darlington, January 4–April 7 (Daley); Pocono Lake, May 26, nest and five eggs (Carter).

Ruby-crowned Kinglet, *Regulus c. calendula*. Vineland, N. J., September 23 (Prince); Moorestown, N. J., September 25 (Mickle); Frankford, December 12, Bustleton, December 16 (2) (Miller).

Hermit Thrush, *Hylocichla g. pallasi*. Cape May, N. J., December 16 (Hand).

Robin, *Planesticus m. migratorius*. Glenolden, February 11 (Carter).

Bluebird, *Sialia s. sialis*. Glenmore, Chester Co., young left the nest April 21 (Lloyd).

*List of Other Species Reported during 1924, and Additional
Notes on Species Contained in the Schedule. Autumn
Dates refer to the Autumn of 1923 unless
Otherwise Stated.*

Pied-billed Grebe, *Podilymbus podiceps*. Bernharts, Berks Co., September 8–November 10, 1923 and April 14, April 20 to May (Poole).

Dovekie, *Alle alle*. Corson's Inlet, N. J., January 7 (Huber).

Loon, *Gavia immer*. Angelica dam near Reading, April 26–29 (Poole)

Herring Gull, *Larus argentatus*. Atlantic City, N. J., August 26, 1923 (Cromie); Vineland, N. J., August 17, 1923 (Prince).

Laughing Gull, *Larus atricilla*. Atlantic City, N. J., May 1 (Cromie).

Bonaparte's Gull, *Larus philadelphia*. Cape May, N. J., December 9, 1923 (6) (Miller).

Black-backed Gull, *Larus marinus*. Seaside Heights, Barnegat Bay, N. J., March 15 (Barker and Morgan).

American Merganser, *Mergus americanus*. Tulpehocken Creek near Reading, December 26-April 12 (Poole), Neshaminy Creek near Doylestown, March 28 (9) and common till early April (MacReynolds).

Mallard, *Anas platyrhynchos*. Near Reading, March 8 and August 10 (Poole).

Black Duck, *Anas rubripes tristis*. Charming Forge, near Reading, March 8 (10) March 9 (2), Blue Marsh, April 5 (Poole).

Baldpate, *Mareca americana*. Reading, November 10, 1923, March 30 and April 5 (Poole).

Blue-winged Teal, *Querquedula discors*. Bernhart's near Reading, April 29, (2) (Poole).

Lesser Scaup, *Marila affinis*. Angelica near Reading, April 10, 14, and 24, and one on the Schuylkill, June 16 to October 2 when it was shot (Poole).

Old-squaw, *Clangula hyemalis*. Near Reading, May 1 (3) (Poole).

Wood Duck, *Aix sponsa*. Doylestown, April 24 and 27, said to be nesting (MacReynolds); near Reading, August 10, 1923 (Poole); Mt. Holly, N. J., four, April 1 (Hacker).

Brant, *Branta bernicla*. Cape May, N. J., January 28, very rare, (Hand).

Canada Goose, *Branta c. canadensis*. Vineland, N. J., October 23, 1923 (Prince); Atlantic City, N. J., large flock flying north February 6 (Carter).

Greater Snow Goose, *Chen hyperborea nivalis*, Cape May, N. J., January 28, one shot (Hand)

Great Blue Heron, *Ardea h. herodias*. Atlantic City, N. J., May 6 (Cromie); Frankford, December 9, 1923 (2) (Miller); Reading, July 21, 26, August 10, September 3, 1923 and April 25 (Poole); Swarthmore, April 26 (2) (Palmer).

Little Blue Heron, *Florida caerulea*. Holmesburg, July 14, 1923 (Miller); Reading, July 26 (3), August 10 and 12, September 3 (5), 1923 (Poole).

Egret, *Casmerodius egretta*. Blue Marsh, Reading, July 26 (2) 1923 (Poole).

Bittern, *Botaurus lentiginosus*. Pine Run, Doylestown, April 27, first time in many years (MacReynolds); Amityville, Berks Co., April 13 (Poole).

Florida Gallinule, *Gallinula galeata*. One came aboard Five fathom Light ship off Cape May, May 18 (Hand).

Sora, *Porzana carolina*. Moselem, near Reading, May 18 (Poole).

Coot, *Fulica americana*. Reading, March 30 and May 18 (2) (Poole); Bridgeboro, N. J., May 4 (Gaede).

Woodcock, *Philohela minor*. Town Bank, Cape May, February 20, apparently nesting; Cape May, N. J., October 18 and 27, a small flight each day (Hand); Pennsville, N. J., March 30, two nests with four eggs each (Miller); Mt. Holly, N. J., March 30, May 10 (Pumyea); Glenolden, April 6 (Gillespie); Haverford, April 12 (Serrill); Reading, April 12 and 27 and May 10 (Poole); Doylestown, flights March 27 and 30 and April 13 (MacReynolds); Lopez, April 21 and May 1, nests with four eggs each (Behr).

Wilson's Snipe, *Gallinago delicata*. Cape May, N. J., flights on October 23, 1923 and April 2 (Hand); Jeffersonville, March 9 (Middleton); Doylestown, April 16 and 27 (MacReynolds); Reading, January 19 and 20 (Poole).

Least Sandpiper, *Pisobia minutilla*. Atlantic City, N. J., May 3 (Cromie); Reading, August 5, 1923 (Poole).

Semipalmated Sandpiper, *Ereunetes pusillus*, Cape May, N. J., April 30 (Hand); Atlantic City, N. J., May 3 (Cromie).

Pectoral Sandpiper, *Pisobia maculata*. Reading, August 5, 1923 (Poole).

Solitary Sandpiper, *Tringa solitaria*. Richmond, July 27 (3) (Miller).

Lesser Yellow-legs, *Totanus flavipes*. Cape May, N. J., a flight on September 10, 1923, many taken (Hand); Richmond, August 10, 1923 (Miller); Reading, August 12, 1923 (Poole).

Greater Yellow-legs, *Totanus melanoleucus*. Atlantic City, N. J., May 6 (Cromie); Haddonfield, N. J., May 2 (Tatum); Mt. Holly, N. J., May 10 and 11 (Pumyea); Lansdowne, May 2 (Carter); Glenolden, April 21 (Gillespie); Jeffersonville, April 30 (2) and May 30 (Middleton); Concordville, April 27 (Styer); Reading, May 5 (2); near Doylestown, May 1 and 10 (MacReynolds).

Upland Plover, *Bartramia longicauda*. Blandon, Berks Co., April 25 and Moselem, May 18 (Poole); Gwynedd Valley, April 24 (Miller); Doylestown, April 24 (MacReynolds).

Ring-necked Plover, *Charadrius semipalmatus*. Atlantic City, N. J., May 6 (Cromie).

Killdeer, *Oxyechus vociferus*. Angelica, Berks Co., January 13 (2) (Poole); Cold Spring cemetery, Cape May, N. J., nest and four eggs, April 20 (Hand).

Turnstone, *Arenaria interpres*. Ocean City, N. J., August 17, 1923 (Prince).

Ruffed Grouse, *Bonasa u. umbellus*. Upper Cape May Co., N. J., December 2 (10) December 4 (3) (Hand).

Mourning Dove, *Zenaidura macroura carolinensis*. Blue Marsh, Reading, January 12 (2) (Poole); Mt. Airy, Phila., February 27 (2) (Miller).

Turkey Vulture, *Cathartes aura septentrionalis*. Cape May, N. J., 34 roosting on the airdrome (Hand).

Mississippi Kite, *Ictinia mississippiensis*. Cape May, N. J., May 30 (Baily, Potter, Stone). [Auk 1924, p. 477.]

Marsh Hawk, *Circus hudsonius*. Jeffersonville, October 20-April 24 (Middleton).

Cooper's Hawk, *Accipiter cooperi*. Byberry, May 19, nest and four eggs (Miller).

Sharp-shinned Hawk, *Accipiter velox*. Cape May, N. J., September 10, a small flight; September 14, a large flight, 900 to 1000 killed; October 18, another flight (Hand).

Broad-winged Hawk, *Buteo platypterus*. Mt. Airy, Phila., April 25 (Jay); Glenolden, April 26 (Gillespie); Wissahickon, April 27 (Barker); Swarthmore, April 27 (Palmer); Reading, April 23 (Poole).

Duck Hawk, *Falco p. anatum*. City Hall, Phila., March 12 and October 9 (Gillespie).

Pigeon Hawk, *Falco columbarius*. Doylestown, March 2 (3), April 2 and 27 (MacReynolds).

Bald Eagle, *Haliaeetus l. leucocephalus*. Reading, January 13 (Poole); Woodland Beach, Delaware, nest and two eggs 45 feet up in sweet gum tree, March 9 (Carter); Paoli, March 3 (McCann).

Osprey, *Pandion h. carolinensis*. Cape May, N. J., September 11, 1923 (Hand).

Barn Owl, *Tyto pratincola*. Mt. Holly, N. J., May 18 (Pumyea); Lansdowne, heard screaming April 28, 9 P. M., and May 2 as it flew over (Carter); Jeffersonville May 3 (Middleton).

Barred Owl, *Strix v. varia*. Haverford, February 12 (McCall).

Great Horned Owl, *Bubo v. virginianus*. Haddonfield, N. J., May 3 (Tatum); Woodland Beach, Del., March 9 (Carter).

Belted Kingfisher, *Ceryle a. alcyon*. Germantown, February 8 (Barker); Chamounix, Phila., January 11 (Miller).

Red-bellied Woodpecker, *Centurus carolinus*. Woodland Beach, Del., March 8 and 9 (Carter).

Yellow-bellied Sapsucker, *Sphyrapicus v. varius*. Frankford, January 24 (Miller); near Reading, January 26 (Poole).

Chimney Swift, *Chaetura pelagica*. Moorestown, N. J., September 27 (Mickle).

Olive-sided Flycatcher, *Nuttallornis borealis*. Vinemont near Reading, May 31 (Poole).

Yellow-bellied Flycatcher, *Empidonax flaviventris*. Vineland, N. J., October 6, 1923 (Prince); Wissahickon, May 13 (Barker); Glenolden, May 25 (Gillespie); Ardmore, May 28 (Baily); Mt. Penn, near Reading, May 30 (12) (Poole).

Alder Flycatcher, *Empidonax trailii alnorum*. Reading, May 25, one singing (Poole).

Phoebe, *Sayornis phoebe*. Vineland, N. J., October 6, 1923 (Prince).

Horned Lark, *Otocoris a. alpestris*. Downstown, N. J., February 4 (Fair); Frankford, February 9 (Miller).

Prairie Horned Lark, *Otocoris alpestris praticola*. Mountain, Berks Co., flock of 25, July 22, 1923 (Poole).

Blue Jay, *Cyanocitta c. cristata*. Moorestown, N. J., unusually abundant September 29, 1923-April 5 (Mickle); arrived Swarthmore, April 20 (Palmer); Ardmore, May 4 (Baily).

Crow, *Corvus b. brachyrhynchus*. Lansdowne, breaking off sticks from tree, March 30 (Carter).

Fish Crow, *Corvus ossifragus*. Byberry, nest and three eggs, May 13 (Miller).

Bobolink, *Dolichonyx oryzivorus*. Moorestown, N. J., heard July 31–August 30, 1923 (Mickle).

Rusty Grackle, *Euphagus carolinus*. Torresdale, December 1 (3) (Miller).

Baltimore Oriole, *Icterus galbula*. Vineland, N. J., September 18, 1923 (Prince).

Bronzed Grackle, *Quiscalus q. aeneus*. Smyrna, Del., one found dead March 8 (Carter).

Snow Bunting, *Plectrophenax n. nivalis*. Barnegat Bay, N. J., November 2, 1924 (Emlen).

Pine Siskin, *Spinus pinus*. Mt. Holly, N. J., April 19, flocks (Barker); May 11 (Pumyea); Swarthmore, May 3 (5) remained several weeks (Palmer).

Purple Finch, *Carpodacus p. purpureus*. Holmesburg and Fairmount Park wintered (Miller); Moorestown, N. J., March 20 (Mickle and Jacob); George School, April 24 for several days (Lippincott).

Pine Grosbeak, *Pinicola enucleator leucura*. Antietam, Berks Co., flock of 8–10, November 25–February 3 (Poole); Lancaster, Pa., March 18 (Marburger).

Henslow's Sparrow, *Passerherbulus henslowi*. Mt. Holly, N. J., May 18 (Pumyea); Carney's Point, April 13 (Miller).

Lincoln's Sparrow, *Melospiza lincolni*. Glenolden, May 25 and 28 same individual trapped and banded (Gillespie).

Chipping Sparrow, *Spizella p. passerina*. Reading, January 17, 1924, one carefully identified (Poole).

Field Sparrow, *Spizella p. pusilla*. Glenolden, until November 19, 1923 (Gillespie); Carsonia, near Reading, January 1 (2), (Poole); Frankford, Phila., two wintered (Miller).

Tree Sparrow, *Spizella m. monticola*. Glenolden, first seen November 19, 1923 (Gillespie).

Junco, *Junco h. hyemalis*, arrived, Downstown, N. J., October 11, 1923 (Fair); last seen at Mt. Holly, N. J., May 19 (Pumyea); George School, May 2 (Lippincott); Doylestown, May 1 (Mac

Reynolds); present at Vineland, N. J., October 18–April 10 (Prince); Moorestown, N. J., October 15–April 26 (Mickle); Jeffersonville, October 7–April 26 (Middleton); Glenolden, September 30–May 2 (Gillespie); Frankford, Phila., September 30–April 27 (Miller).

White-throated Sparrow, *Zonotrichia albicollis*. Glenolden, September 25–May 11 (Gillespie) ten wintered; Vineland, N. J., October 6–May 6 (Prince); Moorestown, N. J., October 5–May 7 (Mickle); Frankford, Phila., September 30–May 17 (Miller); arrived at George School, April 21 (Lippincott); Jeffersonville, April 24 (Middleton); last seen at Mt. Holly, N. J., May 18 (Pumyea).

White-throated Sparrow, *Zonotrichia l. leucophrys*. Reading, May 10, one seen (Poole).

Dickcissel, *Spiza americana*. Near West Chester, caught February 11, 1924 (Carter).

Cardinal, *Cardinalis c. cardinalis*. Nest and eggs, May 10, Swarthmore (Palmer), common at George School, winter and spring (Lippincott).

Scarlet Tanager, *Piranga erythromelas*. Last seen at Vineland, N. J., September 17, 1923 (Prince).

Purple Martin, *Progne s. subis*. Cape May, N. J., last seen September 15, 1923 (Hand).

Tree Swallow, *Iridoprocne bicolor*. Cape May, N. J., October 18, 1923, ten thousand on the wires at Madison St.; November 17, 1500, and December 11, 300. January 21, flock of 34, January 26 (17), February 5 (17) and February 20, over 100 (Hand).

Rough-winged Swallow, *Stelgidopteryx serripennis*. Ocean City, N. J., August 17, 1923 (Prince).

Northern Shrike, *Lanius borealis*. Haddonfield, N. J., February 22 (Tatum), Shortersville, Berks Co., November 4 (Poole).

Black and White Warbler, *Mniotilta varia*. Vineland, N. J., five young, July 19, 1923 (Prince).

Parula Warbler, *Compsothlypis americana usneae*. Vineland, N. J., last seen, September 14, 1923 (Prince).

Prothonotary Warbler, *Protonotaria citrea*. St. Georges, Del., May 17 (Carter).

Golden-winged Warbler, *Vermivora chrysoptera*. Glenolden,

May 4 (Gillespie); Wissahickon, May 8 (Barker); Concordville, May 13 (Styer).

Nashville Warbler, *Vermivora r. ruficapilla*. Glenolden, May 13 (Gillespie); Merion, May 12 (Beatty); Reading, May 4 (Poole); Jeffersonville, May 22-24, five seen (Middleton).

Tennessee Warbler, *Vermivora peregrina*. Glenolden, May 24 (Gillespie); Jeffersonville, May 23 (Middleton); Concordville, May 19 (Styer); Reading, September 8, 16, 22, 23 (Poole).

Cape May Warbler, *Dendroica tigrina*. Vineland, N. J., September 5 and 24, 1923 (Prince); Haddonfield, N. J., May 2 (Tatum) Jeffersonville, May 22 (6), May 26 (1), (Middleton).

Bay-breasted Warbler, *Dendroica castanea*. Moorestown, N. J., May 28 (Jacob); Haddonfield, N. J., May 22 (Tatum); Glenolden, May 25, a wave (Gillespie); Concordville, May 19-31 seven times (Styer); Reading, May 20-June 1, rather common (Poole).

Myrtle Warbler, *Dendroica coronata*. Vineland, N. J., November 3 and December 20 (Prince).

Yellow-palm Warbler, *Dendroica palmarum hypochrysea*. Doylestown one with Juncos, January 1 (MacReynolds).

Mourning Warbler, *Oporornis philadelphia*. Lansdowne, May 25 (Carter); Jeffersonville, May 22 (2), May 24 (1) (Middleton).

Connecticut Warbler, *Oporornis agilis*. Reading, September 16 (Poole).

Water-Thrush, *Seiurus noveboracensis*. Vineland, N. J., September 5, 12 and 24, 1923 (Prince).

Louisiana Water-Thrush, *Seiurus motacilla*. Near Reading, April 13 (Poole).

Hooded Warbler, *Wilsonia citrina*. Glenolden, April 24, May 9, 11, 12 (Gillespie); Concordville, May 22 (Styer); Ardmore, May 1 (Baily); Merion, May 12 (Beatty); Mt. Airy, May 6 (Jay); Wissahickon, May 6 (Barker); Reading, May 6 and 10 (Poole).

Wilson's Warbler, *Wilsonia p. pusilla*. Haddonfield, N. J., May 23 (Tatum); Lansdowne, May 25 (Carter); Concordville, May 20-29, five times (Styer); Glenolden, May 25 (Gillespie); Jeffersonville, May 22 (2) and 23 (Middleton); Reading, May 18 and 25 (Poole); Vineland, N. J., September 20, 1923 (Prince).

Redstart, *Setophaga ruticilla*. Cape May, N. J., September 11 (Hand).

Pipit, *Anthus rubescens*. Haddonfield, N. J., March 23, flock of 6 (Tatum); Mt. Holly, N. J., flock of 150, Nov. 4 (Pumyea).

Mockingbird, *Mimus p. polyglottos*. Downstown, N. J., July 5, 6, 7, 1923 and May 21-24, 1924 (Fair); Glenolden, May 4 (Gillespie); Beach Haven, N. J., August 16, 1924 (M. M. Green).

Catbird, *Dumetella carolinensis*. January 5, near Reading, (Poole).

Carolina Wren, *Thryothorus l. ludovicianus*. Swarthmore, young leaving the nest May 14 (Palmer); nest and 4 eggs, Wissahickon, May 5 (Yoder).

Long-billed Marsh Wren, *Telmatodytes p. palustris*. Cape May, N. J., December 9, 1923, one (Miller).

Winter Wren, *Nannus h. hiemalis*. Glenolden, October 14-April 27 (Gillespie); Frankford, Phila., September 30-April 27 (Miller); Moorestown, N. J., October 24, 1923 (Mickle); April 23, George School (Lippincott); Lansdowne, March 23-24, singing (Carter).

House Wren, *Troglodytes a. aëdon*. Glenolden, Pa., young left nest September 1 (Gillespie).

Brown Creeper, *Certhia familiaris americana*. Moorestown, N. J., October 10-December 25 (Mickle); Glenolden, September 29-April 28 (Gillespie); Frankford, Phila., September 30-April 21 (Miller); Ardmore, April 24-May 2 (Baily); Swarthmore, April 5 and 26 (Palmer); Doylestown, April 24 (MacReynolds); George School, last seen April 27 (Lippincott); Jeffersonville, April 28 (Middleton).

White-breasted Nuthatch, *Sitta c. carolinensis*. Moorestown, N. J., September 21-March 18 (Mickle); Downstown, N. J., October 1, (Fair); Jeffersonville, November 3-April 20 (Middleton).

Red-breasted Nuthatch, *Sitta canadensis*. Moorestown, N. J., September 21-December 25, 1923; Reading on Mt. Penn, September 10-May 17 (Poole); Concordville, September 12, 23 and May 11 (Styer); common on Wissahickon, March 30 (Gaede); Glenolden, September 9, 1923 (Gillespie); Downstown, N. J., February 10 (Fair); Mt. Airy, May 2 (Jay).

Black-capped Chickadee, *Penthestes a. atricapillus*. Glenolden three individuals, October 4 and December 25 (Gillespie); Ardmore, March 30 (Baily); Jeffersonville, January 30 (1) April 13 (3) Middleton.

Tufted Titmouse, *Baeolophus bicolor*. Moorestown, N. J., unusually abundant during the winter of 1923-24 (Mickle); George School, frequent (Lippincott).

Blue-gray Gnatcatcher, *Poliophtila c. caerulea*. Glenolden, April 23, 27 and May 3, September 12, 1924, one seen each time (Gillespie); Jeffersonville, April 26, singing continually for about two hours, very tame (Middleton); Mohnton, Berks Co., May 3, watched for half an hour (Poole); Bridgeton, N. J., May 4 (Matlack); Haddonfield, N. J., April 19 (McMullen).

Golden-crowned Kinglet, *Regulus s. satrapa*. Last seen George School, April 22 (Lippincott); Doylestown, April 22 to May 1 (MacReynolds); arrived but did not winter at Moorestown, N. J., October 10 (Mickle); Glenolden, October 6 (Gillespie); Frankford, Phila., September 30 (Miller).

Ruby-crowned Kinglet, *Regulus c. calendula*. Arrived at Vineland, N. J., October 6, (Prince); Moorestown, N. J., October 4, very abundant (Mickle).

Hermit Thrush, *Hylocichla guttata pallasii*. Vineland, N. J., October 10, 1923 (Prince).

Robin, *Planesticus m. migratorius*. Holmesburg, December 1 (1) (Miller); Cape May, N. J., flights on October 21, 26, 28 and November 10 (Hand).

Bluebird, *Sialia s. sialis*. Holmesburg, December 1 (1) (Miller); Cape May, N. J., October 21 and 26 flights (Hand).