

Thirteen-striped Ground Squirrel (*Citellus t. tridecemlineatus*).
 White-tailed Jack Rabbit (*Lepus townsendii campanius*).
 Domestic Chicken (*Gallus domesticus*).
 Western Meadowlark (*Sturnella neglecta*).
 Bronzed Grackle (*Quiscalus q. aeneus*).
 Richardson Ground Squirrel (*Citellus richardsonii*).
 Arkansas Kingbird (*Tyrannus verticalis*).
 Pheasant (*Phasianus torquatus*).
 Red-winged Blackbird (*Agelaius p. phoeniceus*).
 Kingbird (*Tyrannus tyrannus*).
 Grasshopper Sparrow (*Ammodramus s. bimaculatus*).
 Burrowing Owl (*Speotyto c. hypugaea*).
 Mourning Dove (*Zenaidura m. marginella*).
 Domestic Cat (*Felis domesticus*).
 Lark Sparrow (*Chondestes g. grammacus*).
 Upland Plover (*Bartramia longicauda*).
 Robin (*Turdus m. migratorius*).
 Northern Flicker (*Colaptes auratus luteus*).
 Bull-snake (*Pituophis* sp.).
 Undetermined snakes.
 Virginia Rail (*Rallus l. limicola*).
 Toad (*Bufo* sp.).
 Skunk (*Mephitis* sp.).—CLARENCE COTTAM, *U. S. Biol. Survey, Washington, D. C.*

Mourning Dove Notes.—During the summer of 1930, while attending the University of Missouri at Columbia, the following observations on the Mourning Dove (*Zenaidura macroura carolinensis*) were made.

June 19. Marjorie informed me at noon that a pair of Mourning Doves have a nest on their bathroom window ledge on the second floor. I went over about sundown to look at it from the bathroom. In it are two young doves almost ready to fly. The mother dove sat with her head nearly touching the screen. From the outside the nest is scarcely visible because of the ivy that covers the entire west side of the brick building. My room is next door and directly opposite the nest on the same level. It is unfortunate that I did not bring bands with me to the University, for I might be able to band these doves.

June 20. I arose at 5:30 A. M. and sat down to study at my table by the window. While thus engaged, I heard a dove arrive. He was on the ledge with something for the female. I supposed that he was bringing food for the young. He left and in a few minutes returned again. I counted the trips and from 5:30 to 7:00 A. M. he made twenty-seven trips. I noticed that on most of the trips he brought roots and grass, but carried nothing away. Twice he had so great a load that he could not alight, and had to fly away and drop some of it. Through the ivy leaves I could see her take something and see her body move, but thought she was feeding the young. I wondered what was becoming of all the sticks since none were left in sight. He always announced his arrival and departure with the peculiar sound made by the wings.

June 21. Marjorie told me this morning that there is one egg in the nest. So the twenty-seven trips of yesterday were made by another dove that was re-

building the nest that was deserted late the evening before or before daylight on June 20. The nest had not been allowed to get cold. As the first nest was already above the average built by doves, I suppose the only excuse for building was to satisfy the instinct. I went over at noon and tried to frighten the bird off the nest, but she sat on. Ten noisy girls were using the bathroom, but all the thumping on the screen that one could do would bring only a slight movement of the head.

June 22. 9:50 A. M. The male arrived and the female left. Each time that the exchange takes place, as the arriving dove steps on the ledge, the one leaving flies off the nest and the one arriving immediately steps on. 10:15 A. M. The doves exchange places again. 12:15 P. M. They exchange again. 4:00 P. M. The female is sitting on the nest and the temperature must be at least 110°.

June 24. 7:00 A. M. Each morning the sun shining on one of our windows reflects a sunny spot about two feet square with the center directly on the nest. Thus for about two hours the nest gets the morning sun as well as all of the afternoon sun of this extremely hot summer. Marjorie reported this morning that there are two eggs in the nest. 11:00-12:00 A. M. The male dove sat still for the entire hour on the window ledge while the female sat on the nest.

June 25. 5:00 P. M. The doves exchange places.

June 26. 10:45 A. M. The doves exchange places, the female getting on. 12:00 Noon. The female is still sitting.

June 27. 5:45 P. M. Doves exchange places.

June 28. 5:45 P. M. Doves exchange places.

June 29 and 30. I was not in the room during the afternoon.

July 1. 5:50 P. M. Doves exchange places.

July 2. 11:45 A. M. Doves exchange places. 5:40 P. M. Doves exchange places.

July 3. 5:10 P. M. Doves exchange places. Their timepieces must have been too fast today.

July 5. The young doves are hatched. This is the twelfth day.

July 13. 4:30 P. M. The female left the nest and young alone. Temperature 102° downstairs. 6:00 P. M. The female returned.

July 14. 4:30 P. M. The female left the nest and young alone.

July 15. 4:30 P. M. The male arrived and made a few circles, then lit on the ledge and the female left. Five minutes later he left. The two young birds are now quite large.

July 17. 4:30 P. M. The female pushed one young bird out of the nest. It stood on the ledge trembling and flapping its wings, then retreated while the second one came out and exercised, and returned to the nest.

July 18. The two young doves are sitting on the window ledge.

July 19. They are gone.

It would have been interesting, had there been no lessons to study, to have watched every movement of this pair of doves. At the times that I could observe there seemed to be considerable regularity of time for exchange of places. The second pair of doves must certainly have had the site selected before the first pair left. It was also very interesting to note the confidence that the two pairs of doves put in the window screen.—CORR E. SHOOP, *Mascoutah, Illinois*.