

# LONE STAR TICKS FROM WHITE-TAILED DEER IN ILLINOIS

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**ABSTRACT.**—The lone star tick (*Amblyomma americanum*), not previously reported from Illinois, has been collected from white-tailed deer (*Odocoileus virginianus*) in southern Illinois.

The lone star tick has not previously been reported from Illinois, although Hooker et al. (1912:143) showed the probable range of the species to include the southern half of the state. Parker et al. (1943:728, footnote) reported that the state entomologist W. P. Flint knew of no record of the species in Illinois. Although sporadic attempts have been made to collect the lone star tick in Illinois since 1944, no ticks of this species were collected (Stannard, L. J., personal communication). Lone star ticks have been reported from Kentucky (Hooker et al., op cit.: 144), and from Missouri (Cooley and Kohls, 1944:91-92).

A total of five lone star ticks, all mature females, were collected from white-tailed deer from two places in southern Illinois (TABLE 1). The two places, the Dixon Springs Agricultural Research Center (DSARC), in Pope County, and the Crab Orchard National Wildlife Refuge (CONWR), in Williamson

County, are approximately 35 miles apart.

A total of 59 American dog ticks (*D. variabilis*) were collected from a semi-wild fawn on DSARC during July 1964 (Montgomery, in ms.). In addition to those 59 ticks, a total of 16 ticks were collected on DSARC from 2 of 50 wild, living deer examined for ticks on DSARC during the period March 1964 through November 1966. Fourteen of the ticks, all from one deer, were *D. variabilis*, while the remaining two, one from each of the two deer, were *A. americanum*.

Twenty-nine living deer from CONWR were examined during the period May 1965 through April 1966. One *A. americanum* was collected from each of three of these deer. No other ticks were found when these 29 deer were examined.

## ACKNOWLEDGMENT

This research was supported by Research Grant CC-00052, Communicable Disease Center, Public Health Service. Dr. L. J. Stannard identified the ticks and offered editorial assistance. Dr. Glen C. Sanderson and Helen C. Schultz gave editorial assistance. P. R. Robinson, R. A. Montgomery, and L. D. Martoglio assisted with capture of the deer.

## LITERATURE CITED

- COOLEY, R. A. and G. M. KOHLS. 1944. The genus *Amblyomma* (Ixodidae) in the United States. *J. Parasitol.* 30(2): 77-111.
- HOOKEE, W. A., F. C. BISHOPP, and H. P. WOOD. 1912. The life history and bionomics of some North American ticks. U.S.D.A., Bur. Entomol., Bull. No. 106. 239 pp.
- PARKER, R. R., G. M. KOHLS, and E. A. STEINHAUS. 1943. Rocky mountain spotted fever: spontaneous infection in the tick *Amblyomma americanum*. *Publ. Health Repts.* 58(19):721-729.
- Manuscript received January 14, 1967.*

Table 1.—Dates of Collection, Locations, and Descriptions of Host Deer for Lone Star Ticks Collected in Southern Illinois.

Dates Collected	Number of Ticks	Location	Host Deer	
			Sex	Age
0 July, 1964.	1	DSARC	♂	Fawn
7 February, 1965.....	1	DSARC	♀	Adult
3 March, 1966.....	1	CONWR	♂	Fawn
5 April, 1966.....	1	CONWR	♂	Fawn
7 April, 1966.....	1	CONWR	♀	Adult