

SECTION A, BIOLOGICAL SCIENCES

SUBSECTION BOTANY

Distribution Records of Oklahoma Mosses

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Distribution records of Oklahoma mosses are contained in Emig (1917, 1918), Little (1936a, 1936b), Lowe (1919), Neville (1928) and Sharp (1929, 1930), covering, in all, only twenty-one of the seventy-seven counties. The numbers of species recorded for each of these counties follows: Muskogee (77), McCurtain (54), Tulsa and Osage (51), Cleveland (42), Murray (39), Canadian (30), Comanche (21), Johnston (17), Bryan (12), Delaware (11), Pushmataha (11), Hughes (11), LeFlore (11), Caddo (6), Latimer (4), Roger Mills (2), Greer (2), Choctaw (1), Ottawa (1) and Love (1). These articles record 158 mosses from the state, in contrast to 1,174 for North America north of Mexico (Grout, 1928-1940) and to 14,482 for the world (Reimers, 1954).

The present information on Oklahoma mosses is obviously incomplete. The total number of species is probably well over 200 and no ecological boundaries of even the commonest ones have been determined. It was with these realizations that Dr. Gilford J. Ikenberry at Oklahoma State University commenced a long-term study of Oklahoma mosses. This project has involved thousands of collections from all over the state and is presently being brought to completion. Early in 1958 I became interested in the topic and, under Dr. Ikenberry's guidance, have made many collections and identifications. These results will appear in Dr. Ikenberry's final paper with the exception of two new state records which are presented here.

On April 27, 1958, a moss (Bird 2371) was collected on bare ground in tall-grass prairie six miles south of Davis, Murray Co. The material was identified by Dr. A. J. Sharp as *Acaulon rubrum* (Röhl.) Grout. This has not been recorded for Oklahoma and according to Grout (1928-1940) is very rare in North America. He records it from bare soil, Illinois, Maryland and California. More recently Conard (1945) reports it from Iowa. Whitehouse and McAllister (1954) make this a synonym of *Acaulon rufescens* Jaeg. which is fairly widespread east of the Rockies but has not been found in Oklahoma. Bryan (1956), however, in a detailed cytological paper considers the two species distinct.

The other state record was collected on soil on a sandstone rock five miles northwest of Stillwater, Payne Co., on April 15, 1958 (Bird 2298). This was determined by Dr. Sharp as *Barbula cruegeri* Sond. Steere (1938) has found this "growing on calcareous soil and rocks through the lowlands of tropical and subtropical America; in the United States very common in the coastal plain regions of Texas, Louisiana and Florida."

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