

Notes on Oklahoma Plants

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Lesquerella gordonii (Gray) Wats. and *L. gracilis* (Hook.) Wats. var. *repanda* (Nutt.) Payson. These two annual mustards are frequently confused, probably because the keys usually call for sigmoid pedicels in *L. gordonii*, a characteristic frequently not present when the specimens are not yet in fruiting condition. The pubescence, however, serves to distinguish the two satisfactorily. In *gordonii* the stellae, as measured on the basal leaves, are more than a third of a millimeter wide, whereas in *gracilis* and the var. *repanda* they are definitely less than a third. This measurement can be made rapidly and accurately with the use of a micrometer disc and a magnification of 30x or more.

Lesquerella gordonii occurs in the state from Tillman to Grady to Woods counties and westward.

Lesquerella gracilis var. *repanda* is based on a collection made by Dr. Zina Pitcher from "banks of the Red River," probably from near Fort Towson, Oklahoma. Inasmuch as our Oklahoma material has the characteristic pods of var. *repanda*, all the material from the southern part of the state is considered to be this variety. Its distribution in the state is from McCurtain County west through most of the Red River counties and northward in the limestone region in the south-central part of Oklahoma to Pontotoc County.

Interestingly, *L. gracilis* also occurs in the northern part of the state. Recent collections have been made in Tulsa and Cherokee counties. Payson (1921) cites collections from Payne and Rogers counties. Both of these were collected in the 1890's. References in the literature (Gates, 1940; Hitchcock, 1899; Payson, 1921; Petersen, 1912; Steyermark, 1963) are made to several collections of *L. gracilis* from north of Oklahoma. Steyermark cites two from Missouri, both as var. *gracilis*. These were collected in 1894 and 1900. Four specimens collected prior to 1900 and one in 1902 are cited from Kansas. A specimen from Nebraska is cited as early as 1912. The earliest specimen listed from this northern area is an Engelmann collection, from between the Illinois and Neosho Rivers, collected in 1835. These early collections were made when the prairies were in a more nearly climax condition than now, and hence it seems possible that northern Oklahoma and areas adjacent constitute native range for the species. On the other hand, with some of the specimens being authoritatively considered as var. *repanda* and some as var. *gracilis*, a Texan plant here thought not to occur in southern Oklahoma, other contentions are certainly logical.

The two following specimens, indicated with an asterisk, are newly reported for the state.

**Anthriscus scandicina* (Weber) Mansf. Infrequent weed in shade at Methodist Camp Ground, Devils Canyon, Canadian Co., May 3, 1964, Goodman 7501.

**Stachys palustris* L. var. *pilosa* (Nutt.) Fern. LeFlore Co.: Hopkins and A. & R. Nelson 574; McCurtain Co.: Hopkins and Nelsons 380. Whether this is introduced, as the range would suggest, is not known.

Aster oblongifolius Nutt. var. *angustatus* Shinnars. This taller, more handsome variety is much less widely distributed in Oklahoma than is the type variety. This latter, represented by abundant collections, occurs most frequently in the northern and central parts of the state. The var. *angustatus*, by contrast, is represented by but 5 collections, each from a different county — Adair, Delaware, McCurtain, Muskogee, and Sequoyah.

The variation in the pubescence of this small sample is great. A population analysis and cytological study of this variety possibly could reveal its origin.

LITERATURE CITED

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