

## NOTES ON *EUPATORIUM* (COMPOSITAE) IN ILLINOIS

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**ABSTRACT.**—Two forms of *Eupatorium* new to Illinois are reported for the first time and a note that two typical species attributed to Illinois are best treated as varieties of the species.

Recent investigations of specimens of the genus *Eupatorium* in three Illinois herbaria (Illinois Natural History Survey, Illinois State Museum, and Southern Illinois University) have led to the discovery of the following two forms not previously reported for Illinois.

### *Eupatorium perfoliatum*

#### *L. forma purpureum* Britt.

This plant differs from typical *Eupatorium perfoliatum* in having the flowers purple-colored rather than white and the phyllaries purple-tinged rather than green. The following collection is deposited in the herbarium of the Illinois State Museum: WINNEBAGO CO.: 3½ miles northwest of Rockton, September 9, 1945, G. D. Fuller 11270.

### *Eupatorium coelestinum*

#### *L. forma album* E. J. Alex.

This plant differs from typical *Eupatorium coelestinum* in having the flowers white colored rather than blue to purple. The following collection is deposited in the herbarium of the Illinois State Museum: CASS CO.: R. T. Rexroat 1170.

Further investigations in the herbaria previously mentioned and a study of the literature have led to the discovery that two species attributed to Illinois (*Eupatorium sessilifolium* L. and *Eupatorium rugosum* Houtt.) are present only as varieties (*Eupatorium sessilifolium* L. var. *brittonianum* Porter and *Eupatorium rugosum* Houtt. var. *tomentellum* (Robinson) Blake) of the typical species. The typical species and not the varieties are cited by Jones and Fuller (1955) and Winterringer and Evers (1960).

### *Eupatorium sessilifolium*

#### *L. var. brittonianum* Porter

All the herbarium materials examined fit the description of *Eupatorium sessilifolium* L. var. *brittonianum* Porter which is characterized by having pubescent inflorescence branches. The typical glabrous species occurs in southern and eastern United States according to Fernald (1950) and is not known to be represented in the Illinois flora. Johnson and Iltis (1963) also attribute this variety to Wisconsin and not the typical species.

### *Eupatorium rugosum* Houtt. var.

#### *tomentellum* (Robinson) Blake

All the herbarium materials examined fit the description of *Eupatorium rugosum* Houtt. var. *tomentellum* (Robinson) Blake which is characterized by having tomentellous peduncles. The typical species with glabrous peduncles occurs in southern and eastern United States according to Fernald (1950) and is not known to be represented in the Illinois flora. Johnson and Iltis (1963) also attribute this variety to Wisconsin and not the typical species. On the other hand, Jones (1963) attributes the species and its variety to Illinois; Steyermark (1963) does likewise for Missouri and states that both are common.

### LITERATURE CITED

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