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# FIELDIANA

## Botany

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### *Eplingia*, A New Genus of the Labiatae from Mexico

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The attractive labiate described here and dedicated to the memory of Dr. Carl Epling, long time student of the Labiatae, was first collected in Oaxaca by Dr. Robert W. Cruden. Dr. Cruden showed the specimens to Dr. Epling who disowned them, saying that they were not Labiatae.

Dr. Epling knew the genera of the American Labiatae intimately and when he looked at these specimens I think that he did not recognize the genus and never gave it a second look—simply because if he did not recognize the plant it could not be a labiate!

Dr. Cruden went back to Oaxaca five years later and got more ample material, including pickled flowers and color photographs. These he showed to me at the time I was preparing the manuscript for the Labiatae for the "Flora of Guatemala." The genus was not known to me but proves to be a quite distinct new one.

How this attractive plant could have escaped detection in the relatively well-known area of Oaxaca is difficult to understand.

*Eplingia* belongs in the Tribe: Satureineae, subtribe Lepechinieae of Bentham's treatment of the Labiatae in *Genera Plantarum* (2: 1160–1223. 1876). The outstanding characteristics of this genus which seem to distinguish it from all others are: campanulate calyx with the lobes subequal and the nerves 10, with the median nerves prominent and the sinus nerves inconspicuous; the inflorescence (usually) 3-flowered determinate cymes in axils of upper leaves; stamens long exserted, of about equal length, the anthers with divergent cells and joined across their apices; the nutlets somewhat connate into two usually equal pairs; the plant a shrub.

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I wish to thank Dr. Cruden for sharing with me his material from which Miss Pahl has prepared the accompanying plate.

**Eplingia** L. Wms., gen. nov. Labiatarum.

Frutices; foliis oppositis integerrimis glabris; inflorescentiae e cymis trifloris aut paucifloris efformatae; calyx quinquelobatus campanulatus, lobis leviter inaequalibus lanceolatis acutis decemnerviis; corolla bilabiata, tubo saepius longe exserto, labio postico reflexo integro obovato, labio antico patente, trilobato, lobulis rotundatis, tubo angusto ad basem obscure inflato; stamina 4 subdidynama aequalis longe exserta; antherae biloculares loculis junctis; stylus bifidus, lobis subaequalibus; nuclae ovoideae aut ovatae reticulatae.

Low shrubs. Leaves opposite, ovate to lanceolate-ovate, acute, entire, glabrous or the margin obscurely ciliate, with raised glandular dots below; inflorescences borne one in the axils of the upper leaves, short pedunculate determinate cymes, each usually with only 3 flowers; calyx 5-lobed, campanulate, lobes slightly unequal, lanceolate, acute, about as long as the tube, 10 nerved with prominent median nerve in each calyx lobe and an inconspicuous nerve at each sinus, becoming broadly campanulate in fruit; corolla bilabiate, the tube at least twice as long as the calyx, dorsal lip reflexed, entire, obovate and somewhat cuneate to the base, the ventral lip spreading, prominently trilobate, the lobules rounded, ciliate except mid-lobe prominently bilobulate and twice the size of the lateral lobes, the tube narrow, 1.5-2 mm. in diameter, obscurely inflated at the base, about twice or more the length of the calyx, puberulent inside at the base of the filaments; stamens 4, in two pairs, equal, attached near the base of the corolla tube, filaments glabrous except at the base, twice as long as the corolla, equal or nearly so, anthers two-celled, the cells divergent and joined across the apex; style slender and reaching to the stamens, bifid at the apex into subequal linear lobes; fruit of 4 nutlets in two subequal pairs, each pair connate to near the middle, the nutlets ovoid or ovate, the surface obscurely reticulate.

**Eplingia saxicola** L. Wms. sp. nov.

Frutices usque ad 1 m. alti; folia ovata vel ovato-lanceolata subsessilia integra glabra; inflorescentia cymatosa triflora axillaris; calyx campanulatus, 5-7 mm. longus; corolla rosea bilabiata, labio postico reflexo integro obovato-cuneato, labio antico trilobato, tubo gracili ad basem obscure inflato; stamina subaequalibus; stylus gracilis bifidus, lobis linearibus; nuclae 4-5 mm. longae.

Low shrubs to about 1 m., the stems and branches woody, puberulent above, the older stems glabrous. Leaves ovate or ovate-lanceolate, acute, nearly sessile, entire, glabrous, obscurely glandular below, 10-30 mm. long and 5-10 mm. broad; inflorescences usually 3-flowered determinate cymes in axils of upper leaves, puberulent, peduncles slender, 10-15 mm. long, usually bibracteate at the apex, pedicels to 8 mm. long, usually 1-2 bracteolate near the apex; calyx campanulate, 5-7 mm. long, sparsely pubescent along the 5 principal nerves and the margin of the lobes, lobes lanceolate, acute or subacuminate, 3-4 mm. long, 1.5-2 mm. broad at the base, somewhat accrescent in fruit; corolla rose, bilabiate, 2-2.5 cm. long, the posterior lip entire, obovate-cuneate, 8-10 mm. long and 5-6 mm. broad near the apex, the anterior lip trilobate with the mid-lobe bilobulate, 8-10 mm. long, the lateral lobes rounded, about 5 mm. long, the mid-lobe 10-12 mm. broad,



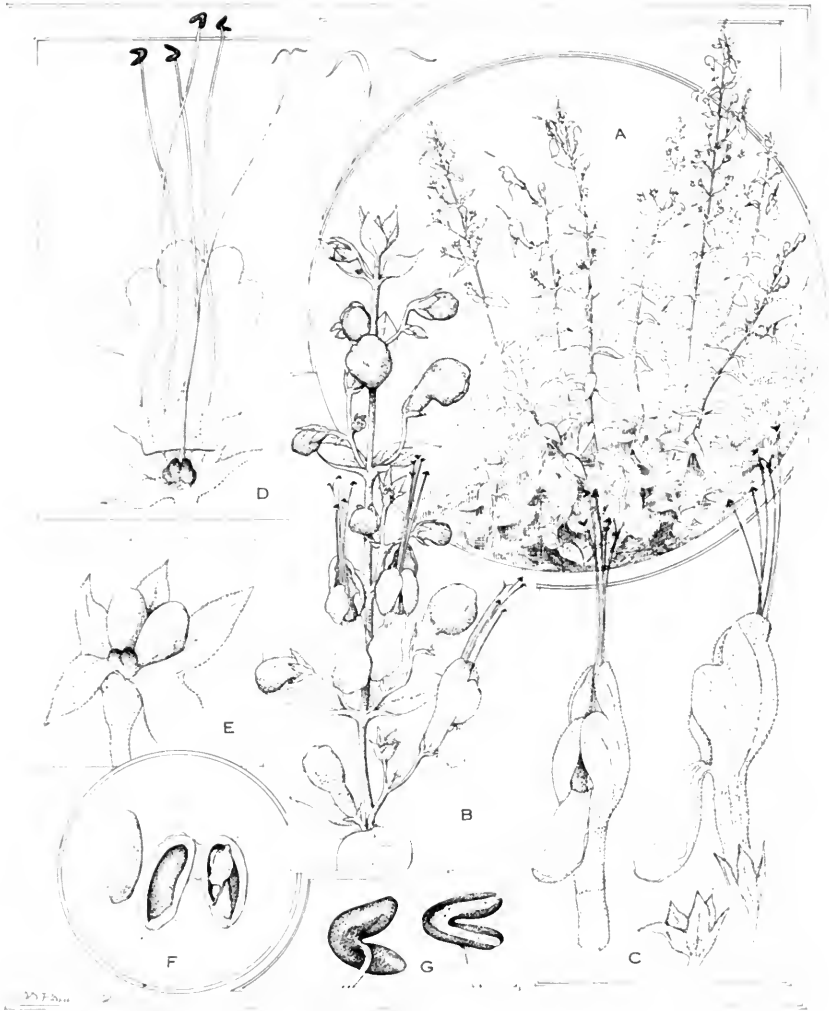


FIG. 1. *Eplingia saxicola*. A, habit of plant from color photographs and the type,  $\times 1/6$ ; B, flowering apex of a stem, from the type, photographs and material in liquid,  $\times 3/4$ ; C, two flowers in natural position, from material in liquid,  $\times 2$ ; D, a flower dissected,  $\times 2$ ; E, nutlets *in situ*, one pair aborted,  $\times 3 1/2$ ; F, nutlets, one dissected,  $\times 5$ ; G, anthers, back and front,  $\times 8$ .

retuse and bilobulate, the corolla tube 10-14 mm. long, slender, 1.5-2 mm. in diameter, obscurely enlarged at the base; stamens 4 in 2 subequal pairs, the filaments attached near the base of the corolla tube, 35-40 mm. long, anthers versatile, 2-celled, the cells divergent, joined across their apices, about 1.5 mm. long; style slender, bifid at the apex into linear lobes, as long as the filaments; nutlets large, ovoid, the surface obscurely reticulate, 4-5 mm. long and 1.5-2 mm. broad.

Mexico: flowers rose-pink, plant a shrub to almost a meter high, steep rocky hillside with many bromeliads, *Echeveria*, *Selaginella*, route 15 at K 376, ca. 13.5 km. northwest of Tamazulapán, Oaxaca, elevation ca. 2,260 m., 21 July 1966, *Cruden 1094* (UC); low bush, flowers pink, stamens exserted, at base of rock wall with *Salvia*, *Ruta* 190, between K. 72 and 73, ca. 5.5 km. N.W. of Yanhuitlán, Oaxaca, alt. ca. 2240 m., 7 September 1971, *Cruden 1950* (type, F; IA, UC).











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