## MALPIGHIACEAE

Banisteria cornifolia (HBK.) Spreng.—Shore near end of Fairchild Trail, Wetmore & Abbe 63; Fairchild Point, Shattuck 645. A large woody vine; leaves short-petiolate, opposite, elliptic to lanceolate, sparsely strigose beneath, coriaceous; flowers small, yellow, in axillary racemes or corymbs; sepals with large dorsal glands (as in many other plants of the family); fruit of large samaras resembling those of the Maple. The species is new to the Canal Zone flora.

Bunchosia cornifolia HBK.—Kenoyer & Standley (p. 151). A shrub; leaves short-petioled, broad, elliptic to ovate, densely strigose beneath; ovary pubescent; flowers yellow, in axillary racemes or panicles; fruit drupaceous, juicy, red.

Bunchosia nitida (Jacq.) DC.—Standley (Suppl. 123). A shrub 2 meters high; leaves elliptic to lanceolate, glabrous, at least in age; ovary glabrous; fruit 1.5 cm. in diameter. The species is known in the Canal Zone only from Barro Colorado Island.

Byrsonima coriacea (Swartz) Kunth. Nance. — Wheeler Trail, Starry 129. A shrub or small tree; leaves oblong or elliptic, glabrous or nearly so; fruit a drupe 1 cm. in diameter. The species is an addition to the known flora of Central America.

Byrsonima crassifolia (L.) DC. NANCE.—Kenoyer & Standley (p. 151). A small tree; leaves mostly obovate, densely grayish or brownish tomentose beneath; flowers in terminal racemes, the showy petals bright yellow, turning reddish as they wither; fruit a globose, yellow drupe 1 cm. in diameter. The ripe fruits are edible, with a flavor somewhat suggestive of

green apples. They are eaten mostly by children and birds, but sometimes they are offered for sale in the Central American markets. In the drier parts of the Pacific slope this species often forms extensive thickets of distinctive aspect. The trees are conspicuous when loaded with their handsome golden blossoms.

Hiraea fagifolia (DC.) Juss.—Standley (Fl. 21). A woody vine; leaves acuminate, glabrous or nearly so; wings of the fruit membranous.

Hiraea faginea (Swartz) Niedenzu.—Kenoyer & Standley (p. 151). A climbing shrub; leaves acuminate, densely sericeous beneath with lustrous hairs; flowers yellow; fruit of samaras, the wings coriaceous. This is No. 1 on page 228 of the Flora of the Canal Zone. Through an error the name is printed there as "H. fagifolia (Swartz) Niedenzu."

Hiraea obovata Niedenzu.—Without locality, Aviles. Leaves obovate, usually rounded at the apex.

Hiraea smilacina, sp. nov.—Pl. XIII. — Frutex scandens, ramis crassis teretibus brunneis plus minusve rimosis lenticellis paucis parvis elevatis pallidis notatis ad nodos strigosis; folia magna, breviter petiolata, firme membranacea, petiolo crasso 1.5-2 cm. longo strigoso; lamina oblongo-elliptica, circa 17 cm. longa et 9 cm. lata, abrupte cuspidato-acuminata acumine longe anguste attenuato fere 2 cm. longo, basi anguste rotundata vel subemarginata, supra in sicco fusca, tantum ad costam pilosa aliter glabra, nervis manifestis sed vix prominentibus, subtus pilis laxis albis intertextis induta, costa gracili elevata, nervis fateralibus utroque latere circa 9 angulo semirecto adscendentibus; pedunculi axillares solitarii, circa 4.5 cm. longi, ut videtur recurvi, validi, dense strigosi, floribus numerosis umbellatis, pedicellis crassiusculis 1.5-2 cm. longis strigosis patentibus vel szepe subcurvis, bracteis apice pedunculi dense congestis ob-Tongis dense pilosis 3 mm. longis; sepala eglandulosa, 2-2.5 longa, anguste triangularia, acuta, dense albido-strigosa, erecta; petala lutea, glabra, longe unguiculata ungue gracili 3 longo, limbo rotundato vel subquadrato cochleari 4 mm. lengo subintegro, quinti prope apicem profunde laciniato.

Panama: Barro Colorado Island, Canal Zone, June 27, 1931. L. H. & Ethel Zoe Bailey 403 (Herb. Field Mus. No.

643070, type); Barro Colorado Island, cove west of Fuertes House, Feb. 22, 1932, R. H. Woodworth & P. A. Vestal 661.

Related to *H. multiradiata* Juss., of French Guiana and Colombia, but differing in several details from Niedenzu's description of that species. Among the Central American species of *Hiraea* the present plant may be recognized at once by its simple umbels, strongly suggestive of those of the genus *Smilax*.

Malpighia glabra L.—Zetek Trail, Shattuck 511. A shrub or small tree; leaves elliptic, acute, glabrate; flowers pale red, in sessile cymes; fruit a globose red drupe. The species is new to the flora of the Canal Zone. The intensely acid fruits are edible.

Spachea elegans (F. W. Meyer) Juss.—Standley (Suppl. 123). Near Pearson Trail, Bangham 579; Salvoza 1000; unknown elsewhere on the North American continent. A tree 8 meters high; leaves acute, glabrate; flowers in long racemes; fruit a small nutlike capsule.

Stigmaphyllon ellipticum (HBK.) Juss.—Kenoyer & Standley (p. 151). A small woody vine; leaves small, glabrous or nearly so, without marginal glands.

Stigmaphyllon Humboldtianum Juss.—Standley (Fl. 21). A woody vine; leaves broad, sericeous or tomentose beneath, bearing stalked glands along the margins; flowers bright yellow, showy; fruit of 3 large samaras.

Stigmaphyllon hypargyreum Triana & Planch. — Standley (Suppl. 123). Leaves without marginal glands, densely covered beneath with silvery shining hairs.

Tetrapteris Seemanni Triana & Planch.—Shore east of Barbour Point, Wilson 149; end of Miller Trail, Starry 285; clearing around Bangs House, end of Chapman Trail, Wetmore & Abbe 186; shore north of Zetek House, Woodworth & Vestal 695. A large woody vine; leaves glabrous; flowers large and showy, yellow, turning orange as they wither; fruit of 3 large samaras.