

New and interesting species of Chrysobalanaceae

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Abstract

Four new species of *Licania* and two of *Hirtella* are described and additional notes are given on three other little known species of Chrysobalanaceae. All the new species have been collected recently since 1972 when the author monographed the neotropical Chrysobalanaceae. Three of the new species are from Amazonia, two from Panama, and one from Pacific coastal Colombia confirming that these three areas still have many undescribed species and are in need of further exploration.

INTRODUCTION

Since my monograph of the Chrysobalanaceae, in 1972 (Prance, 1972) many new species of Chrysobalanaceae have been discovered. Twenty new species have been described in Lundell (1974) and Prance (1973, 1974a, 1974b, 1976, 1977, 1978 in press). The quantity of new material still being discovered from many parts of the neotropics indicates that there is still much exploration to be done. The present paper presents another six new species all based on material collected between 1972 and 1976 that have been sent to me for identification. Table 1 gives a summary of all additions to the neotropical Chrysobalanaceae since the 1972 monograph.

Licania Aublet

1. *Licania cuatrecasasii* Prance, sp. nov.
(Fig. 1)

Licania ab subgenero *Moquilea* sectio *Leptobalanus* pertinens. Ab *L. apetala* (E. Mey.) Fritsch et *L. sparsipilis* Blake foliis dense brunneo-lanato-pubescentibus, venis subtus profunde reticulatis, apicibus cuspidatis, petiolis longioribus usque ad 11 mm longis eglandulosis; inflorescentibus brunneo-tomentosis; receptaculis late campanulatis differt.

Tree to 30 m tall, the young branches puberulous soon becoming glabrous. Leaves with laminae elliptic, coriaceous, 8-12.5 cm long, 3-5.8 cm broad, cuspidate at apex, the acumens 10-15 mm long, slightly curved, subcuneate at base, glabrous above, with a compact brown lanate pubescence beneath; primary veins 10-12 pairs, prominent beneath, prominulous above; midrib prominent on both surfaces; petioles 8-11 mm long, tomentellous when young, terete or slightly canaliculate, eglandular, transversely rugulose. Stipules caducous (no seen). Inflorescences of racemose panicles usually once branched with occasionally secondary branches to 10 cm long, the rachis and branches brown tomentellous. Flowers \pm 2.5 mm long, sessile on primary and secondary branches of inflorescence. Bracts and bracteoles ovate, ca 1 mm long, persistent, tomentellous on exterior, entire, eglandular. Receptacle broadly campanulate, tomentose on exterior, pilose within. Calyx lobes acute, tomentellous on exterior, puberulous within. Petals absent. Stamens 10-12, inserted in a complete circle; filaments far exceeding calyx lobes, free to base, glabrous. Ovary inserted at base of receptacle villous around base, but glabrous above. Style glabrous, equalling filaments in length. Fruit not seen (25-30 mm according to field notes).

TYPE: Colombia. Valle, Alto Yunda, Rio Anchicaya, 1000 m alt., fl Oct 1972, S. Hilty 0-1 (Holotype, US; Isotype, NY).

The field notes observe that it flowers in October and the fruits mature in March-June. It is an uncommon tree in the type locality.

Licania cuatrecasasii belongs to subgenus *Moquilea*, section *Leptobalanus*. This species from the highlands of Valle comes from an area in need of further exploration. It is most closely related to *L. apetala* and *L. sparsipilis* Blake, but differs from both species in the dense lanate-brown pubescence of the leaf

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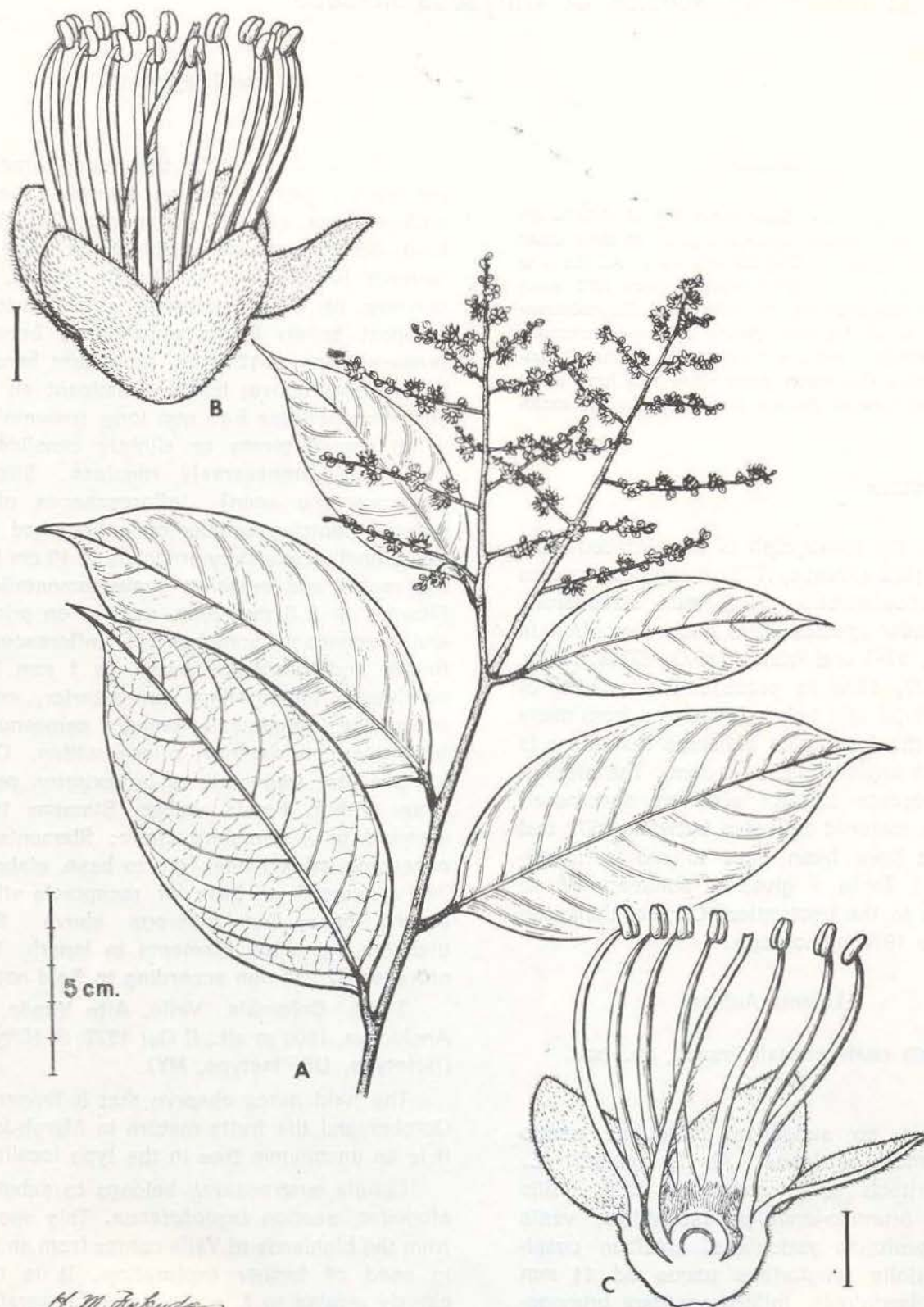


Fig. 1. *Licania cuatrecasatii* Prance (Hilty 0-1): A, habit; B, flower; C, flower section.

TABLE 1. New Species of Neotropical Chrysobalanaceae described since monograph (Prance, 1972)
a. species prior to the present publication

	Locality	Date of Type collection
<i>Couepia dolichopoda</i> Prance (1974b)	Peru: Loreto	1972
<i>C. edulis</i> (Prance) Prance (1974a, 1975)	Brazil: Amazonas	1971
<i>C. marlenei</i> Prance (1974a)	Brazil: Amazonas	1972
<i>Hirtella arenosa</i> Prance (1976)	Brazil: Amazonas	1968
<i>H. conduplicata</i> Prance (1976)	Brazil: Amazonas	1973
<i>Licania aracaensis</i> Prance (1976)	Brazil: Amazonas	1975
<i>L. cabreræ</i> Prance (1976)	Colombia: Antioquia	1957
<i>L. cecidiophora</i> Prance (1978)	Peru: Amazonas	1974
<i>L. chiriquensis</i> Prance (1977)	Panama: Chiriquí	1975
<i>L. furfuracea</i> Prance (1976)	Venezuela: Bolívar	1975
<i>L. guatemalensis</i> Lundell (1974)	Guatemala	1971
<i>L. jefensis</i> Prance (1976)	Panama	1969
<i>L. jimenezii</i> Prance (1973)	Suriname	1971
<i>L. marlenei</i> Prance (1976)	Brazil: Amazonas	1972
<i>L. mexicana</i> Lundell (1974)	Mexico: Sinaloa	1943
<i>L. montana</i> Prance (1976)	Venezuela: Lara	1975
<i>L. morii</i> Prance (1976)	Panama	1975
<i>L. pakaraimensis</i> Prance (1976)	Venezuela: Bolívar	1973
<i>L. stewardii</i> Prance (1976)	Brazil: Amazonas	1974
<i>L. sp. nov.</i> (in press)	Ecuador: Napo	1969

b. species in the present publication

<i>Hirtella magnifolia</i> Prance	Brazil: Amazonas	1976
<i>Hirtella revillae</i> Prance	Peru: Loreto	1975
<i>Licania cuatrecasasii</i> Prance	Colombia: Valle	1972
<i>L. fasciculata</i> Prance	Panama	1972
<i>L. joseramosii</i> Prance	Brazil: Amazonas	1976
<i>L. kallunki</i> Prance	Panama	1975

undersurface which is set in a deeply reticulate secondary and tertiary venation. Also in the long cuspidate leaf acumen, the larger petioles without the 2 glands of *L. sparsipilis*, the brown tomentose pubescence of the inflorescence, and the very small broadly campanulate receptacle.

This species is named in honor of Dr. José Cuatrecasas, who sent the type specimen to me and whose pioneer explorations in Valle still form the basis for most of our knowledge about the plants of that region.

2. *Licania fasciculata* Prance, sp. nov.

(Fig. 2)

Licania ab subgenere *Moquilea* sectio *Moquilea* pertinens. Ab aliis speciebus inflorescentibus fasciculatis differt. Ab *L. cabreræ*, *L. montana*, *L. durifolia*, *L. veneralensis* foliis parvioribus, nervis primariis impressis, staminibus pluribus differt.

Tree 12 m tall, the young branches tomentellous, becoming glabrous and prominently lenticellate with age. Leaves with laminae oblong to oblong lanceolate, thickly coriaceous, 9-13.5 cm long, 2.8-4 cm broad, acuminate at apex, the acumen 4-7 mm long, abrupt, cuneate at base, glabrous above, with a compact appressed gray-lanate pubescence beneath; midrib prominulous and tomentellous above, prominent beneath; primary veins 15-19 pairs, prominent beneath, slightly impressed above; petioles 5-10 mm long, tomentellous, terete. Stipules 3 mm long, persistent, membranous, puberulous, axillary. Inflorescences of short fasciculate racemes 1-2.5 cm long with flowers densely clustered completely obscuring the rachis. Bracts and bracteoles ovate, tomentellous, subpersistent. Flowers 6-7 mm long. Receptacle cupuliform, tomentose on exterior, tomentose within. Calyx lobes acute, tomentellous on both surfaces. Petals 5, white, puberulous on exterior.

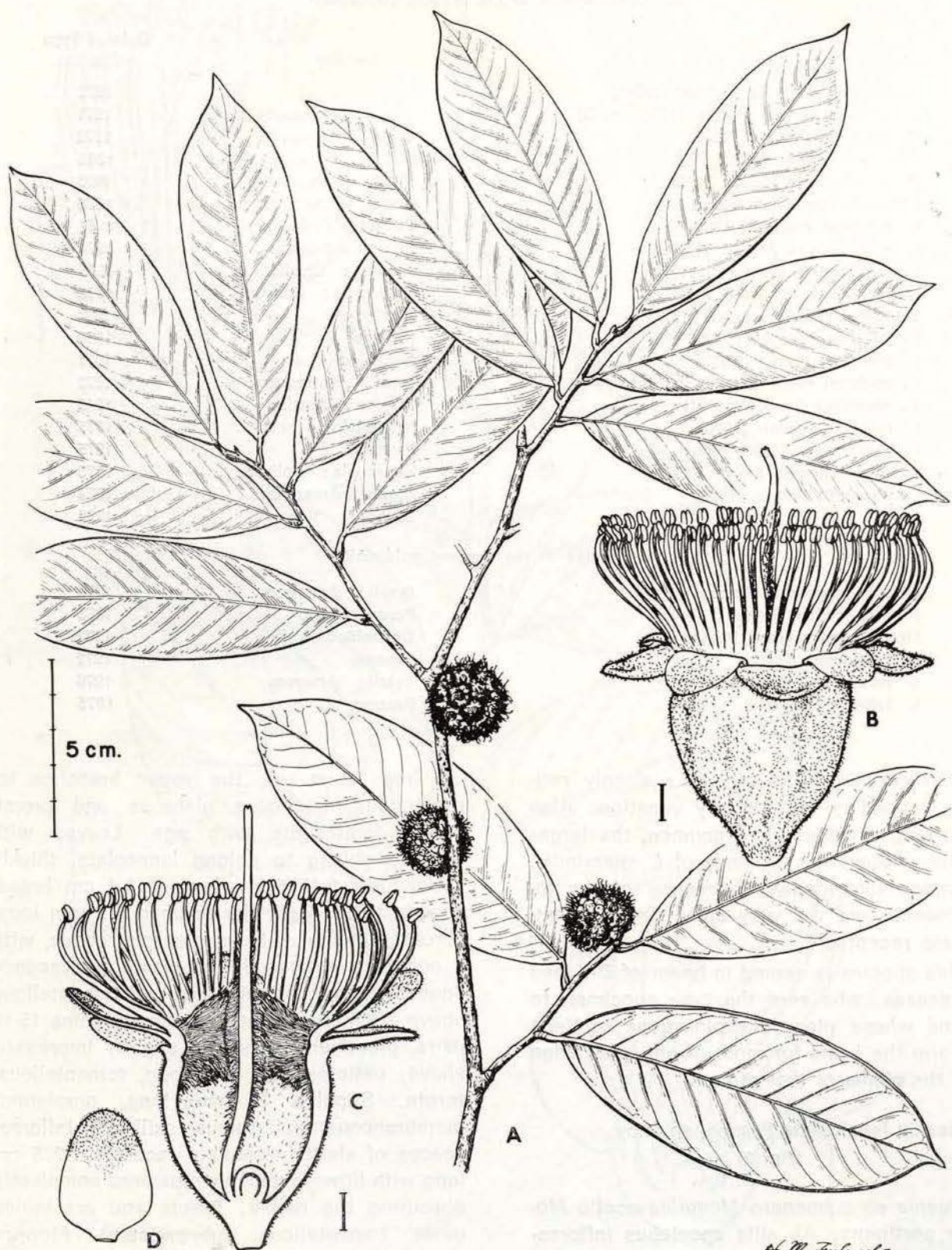


Fig. 2. *Licania fasciculata* Prance (Correa & Dressler 1815): 1, habit; B, flower; C, flower section; D, petal.

Stamens ca 60, inserted in complete circle; filaments far exceeding the calyx lobes, glabrous united at base, the basal fused portion bent inwards, villous. Ovary inserted at base of receptacle, pilose. Style villous for two-thirds of length. Fruit not seen.

TYPE. Panama: Zona de Santa Rita, fl. 31 Aug. 1972. M. D. Correa A. & R. L. Dressler 1815 :(**Holotype**, MO).

Licania fasciculata belongs to subgenus *Moquilea*, section *Moquilea*. It differs from all other species in the section by the fasciculate dense-flowered racemose inflorescence. It is most closely related to the species group of *L. maritima*, *L. cabreræ*, *L. durifolia*, *L. montana*, *L. macrocarpa* and *L. veneralis*, having the same pubescence and venation pattern of the leaf undersurface. It differs in the inflorescence and in the smaller leaves with fewer primary veins which are impressed on the upper surface. *L. fasciculata* also has a greater number of stamens than the other species listed above. It is a most distinct species which is not easily confused with any others in the genus.

Note: another collection by the same collectors probably belongs to *Licania fasciculata*. Correa et al 1852 from Panama, Camino de Llano a Cartí entre los 14 a 18 kms, de la Carretera a Chepo, 400 m alt, 20 Feb 1973 (MO). This specimen has young fruit only. The leaves are broader, more oblong with less acute bases than in the type. Further material will be needed to determine the variation in this species and N^o 1852 is only referred to this species with some hesitancy. The leaf venation, stipules and stem are all very similar to the type of *L. fasciculata*.

3. *Licania joseramosii* Prance, sp. nov.
(Fig. 3)

Licania ab subgenere *Moquilea* sectio *Leptobalanus* pertinens. Ab *L. emarginata* et *L. calvescens* foliis maioribus 13-20 cm longis, glabris; ramis inflorescentiarum parvis, 1-3 floribus ferentibus; floribus 5 mm longis; staminibus 19 differt.

Small tree 5m tall, the young branches glabrous. Leaves with laminas oblong to oblong-lanceolate, coriaceous, 13-20 cm long,

4-6.5 cm broad, finely acuminate at apex, the acumen 15-20 mm long, cuneate at base, glabrous on both surfaces; primary veins 9-14 pairs, prominulous on both surfaces; midrib prominent on both surfaces; petioles 4-5 mm long, rugulose tomentellous when young, terete, with 2 glands near junction with lamina. Stipules linear, ca 6 mm long, hispidulous, caducous. Inflorescences of panicles with long thick central rachis and short, thin, lateral branches bearing 1-3 flowers, the rachis and branches tomentellous. Flowers \pm 5 mm long. Bracts and bracteoles lanceolate, subpersistent, tomentellous on exterior, glabrous within, entire, with long thin acumen, eglandular. Receptacle campanulate, gray tomentose on exterior, tomentose within. Calyx lobes acute tomentose on exterior. Petals absent. Stamens ca 19 inserted around complete circle; filaments slightly exceeding calyx lobes, free to base, glabrous except for pilose annular ring. Ovary inserted at base of receptacle, lanate. Style glabrous, equalling filaments in length. Fruit not seen.

TYPE. Brazil. Amazonas, Manaus-Caracari road, Km 130, fl 6 Jan 1976 Monteiro & Ramos 29. (**Holotype**, INPA 54340; **Isotype**, NY).

Licania joseramosii belongs to subgenus *Moquilea*, section *Leptobalanus*. It is a most distinct species that cannot be easily confused with any other in the genus. It is related to *L. emarginata* and *L. calvescens* but differs in a large number of characters such as the much longer leaves, the larger flowers, the distinctive inflorescence etc. It differs from *L. emarginata* in the greater number of stamens, and from *L. calvescens* in the flowers borne in small groups on secondary inflorescence branches and in the glabrous leaves. Superficially *L. joseramosii* also resemble *L. longipedicellata* in subgenus *Moquilea* section *Moquilea* but it differs in the smaller thicker leaves, the much less branched inflorescence, the smaller flowers, and the absence of petals.

This is a second new species of *Licania* described from material collected in the vicinity of Igarapé Lajes on the Manaus-Caracari highway where there was a most interesting campina vegetation over a sandstone rock outcrop. The other species *Licania ste-*

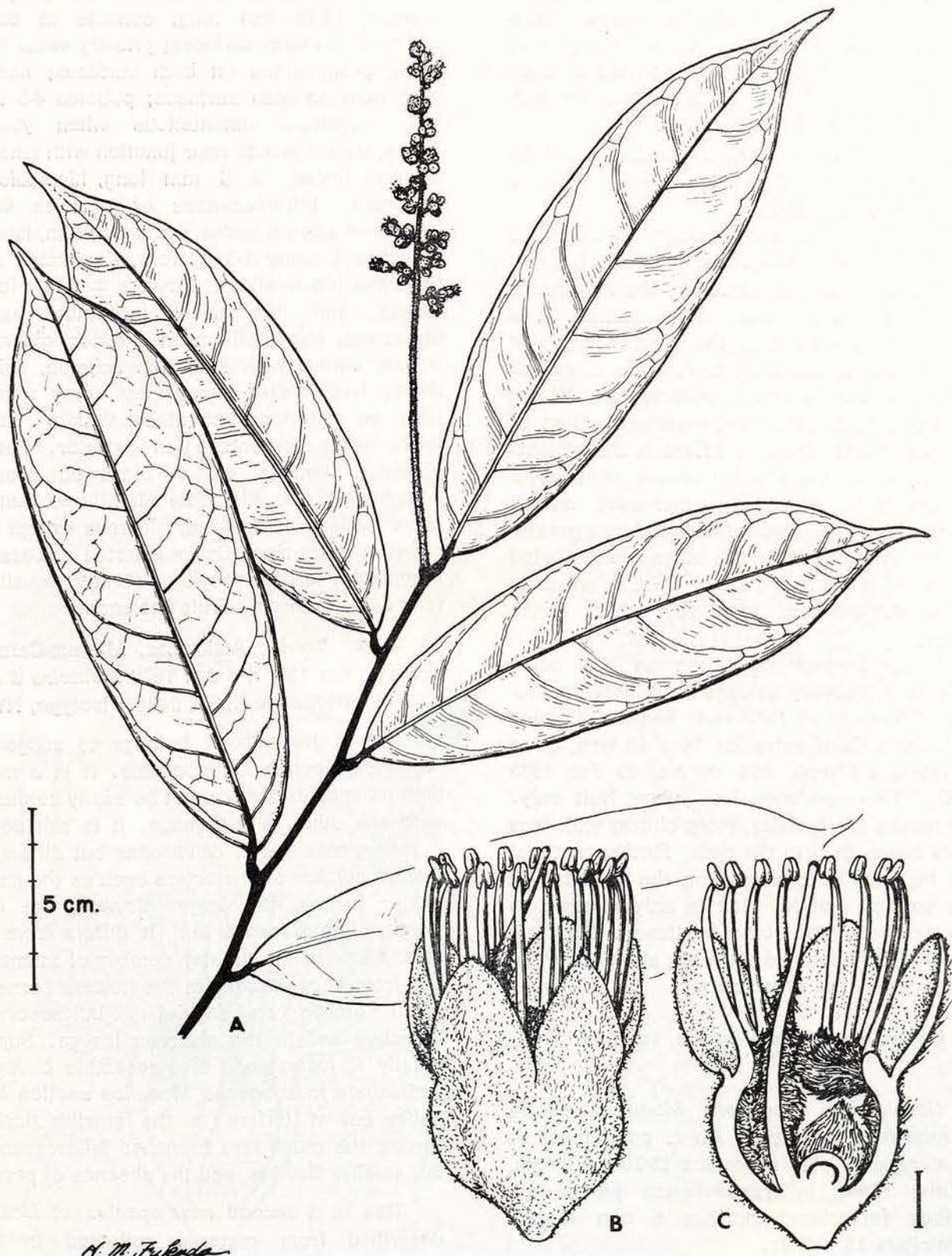


Fig. 3. *Licania joseramosii* Prance (Monteiro & Ramos 29): A, habit; B, flower; C, flower section.

wardii was described in Prance (1976). This habitat which was totally destroyed by colonization in several plant families.

It is a pleasure to dedicate this species in thanks to José F. Ramos who has worked with me as field assistant since 1965 and is one of the collectors of the type specimen.

4. ***Licania kallunkii*** Prance, sp. nov.
(Fig. 4)

Licania ab subgenero *Moquilea* sectio *Moquilea* pertinens. Ab *L. minutiflora* (Sagot) Fritsch inflorescentibus paniculatis floribus in cymulis pluribus 2 vel 3 floribus breviter pedunculatis contractis; foliis parvioribus, apicibus laminarum cuspidatis; stamina 11-12 differt.

Tree 14 m tall, the young branches very sparsely puberulous soon becoming glabrous, not conspicuously lenticellate. Leaves oblong, the laminas coriaceous 5.5-10.5 cm long, 2.2-4.0 cm broad, cuspidate at apex, the acumen 6-10 mm long, subcuneate at base; glabrous on both surfaces; midrib plane above, prominent beneath, glabrous, primary veins 9-12 pairs almost plane and inconspicuous on both surfaces, glabrous; petioles 6-7 mm long, glabrous, canaliculate, eglandular. Stipules small, lanceolate, puberulous, caducous. Inflorescences terminal and axillary panicles 5-11 cm long, 3 branched, the rachis and branches sparsely gray puberulous. Flowers 2.5-3 mm long, borne in few-flowered (2-3) cymules attached to primary branches by short secondary branches or peduncles. Bracts and bracteoles very early caducous (not seen). Receptacle campanulate, gray puberulous on exterior, tomentose within; pedicels ca 1 mm long, gray puberulous. Calyx lobes acute gray puberulous on both surfaces. Petals 5, white. Stamens 11-12, inserted in a complete circle; filaments exceeding calyx-lobes, free to base. Ovary inserted at base of receptacle, almost glabrous with only a few hairs. Style lanate on lower portion, equalling filaments in length. Fruit not seen.

TYPE: Panama: Colon, Santa Rita Road, 17 km from Boyd-Roosevelt Highway, 450 m alt., fl. 14 Mar 1975. S. Mori & J. Kallunki 5052 (Holotype, NY; Isotype, MO).

HABITAT: Wet forest.

Licania kallunkii belongs to subgenus *Moquilea* section *Moquilea*. It is most closely related to *L. minutiflora* (Sagot) Fritsch a species of the Guianas and Northern Amazonia, but it differs in the inflorescence where the flowers are borne in small groups on short tertiary inflorescence branches, in the smaller leaves, with a more cuspidate acumen, and in the fewer stamens. Since *L. kallunkii* has only 12 stamens it has fewer than any other species of the section, but its exerted stamens and presence of petals as well as its similarity to *L. minutiflora* all place it in section *Moquilea*. It differs from another related and recently described species from Panama in the same section, *L. chiriquiensis* Prance (1977), in many characters including the smaller flowers with a gray puberulous not yellow tomentellous indumentum and the spreading much longer inflorescences, the thinner chartaceous leaves with a more cuspidate attenuate apex etc.

This species is named for one of the collectors Ms. Jackie Kallunki whose collections with S. Mori in Panama have discovered many novelties.

5. ***Licania guatemalensis*** Lundee Wrightia 5(2): 39. 1974.

Tree ca 30 m, the young branches glabrous. Leaves with laminas broadly elliptic, 10-21 cm long, 5.5-9.5 cm broad, apex with short acumen 4-7 mm long, base rounded to subcuneate, glabrous on both surfaces; primary veins 8-10 pairs, prominulous on both surfaces, secondary venation prominulous and conspicuously reticulate on both surfaces; midrib prominulous and flattened on both surfaces, glabrous; petioles 3-5 mm long, slightly canaliculate, glabrous. Stipules small, triangular, axillary. Inflorescences terminal panicles to 13 cm long, the flowers borne in small groups on short secondary branches, the rachis puberulous soon glabrescent, the branches gray tomentellous. Flowers ca 2.5 mm long. Bracts and bracteoles small, ovate, persistent, tomentellous. Receptacle campanulate, tomentellous on exterior, tomentose within. Calyx lobes small, to 1 mm long, triangular, tomentellous on exterior, puberulous within. Petals 5, white, tomentellous on exterior,

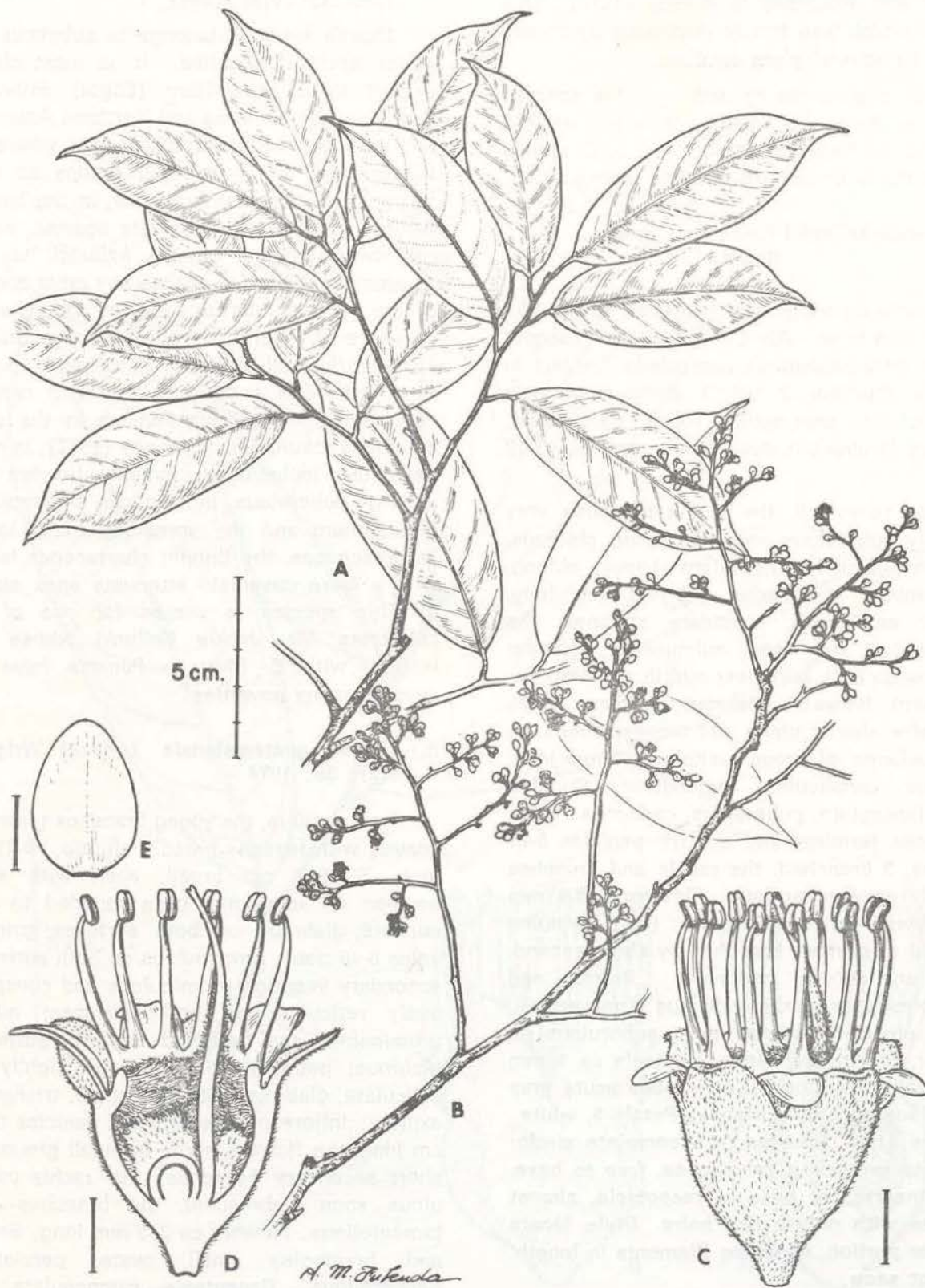


Fig. 4. *Licania kallunkii* Prance (Mori & Kallunki 5052) : A, habit; B, inflorescence; C, flower; D, flower section; E, petal.

sticking together and dehiscing in a calyptro-like mass, 1.2 mm long. Stamens 13-15, inserted in a complete circle, filaments far exceeding calyx-lobes, free to base, glabrous. Ovary inserted at base of receptacle, tomentose on exterior. Style glabrous. Fruit not seen.

TYPE. *Contreras* 10742, Guatemala, Dept^o Izabel, between Seja and Fronteras on Peten-Guatemala road, fl (**Holotype, LL; Isotype, US**).

DISTRIBUTION. Known only from the type gathering from high forest. Flowering in May.

Licania guatemalensis belongs to subgenus *Moquilea* section *Moquilea* and is quite distinct and not easily confused with any other species in the section. The leaves appear quite different in their venation and flattened midribs with short, thick petioles. It is probably closest to *L. kallunki* Prance from Panama, but differs in the much longer leaves with abrupt acumen, the shorter, thicker petioles, the smaller petals, the glabrous style etc.

6. ***Licania mexicana*** Lundell, *Wrightia* 5(2): 40. 1974.

Tree 10 m tall, the young branches lanate to puberulous and soon glabrous. Leaves with laminae narrowly oblong to lanceolate, coriaceous, 6.5-13 cm long, 2.5-4 cm broad, gradually attenuate to acute apex, cuneate at base, glabrous above, with a soon caducous lanate pubescence beneath when young only; midrib prominulous above, prominent beneath; primary veins 6-8 pairs, prominulous on both surfaces, secondary venation prominulous and conspicuously reticulate on both surfaces; petioles 1.5-3.5 mm long, rugose, terete, lanate when very young soon becoming glabrous. Stipules triangular, persistent, 2 mm long, axillary, lanate when young. Inflorescence of terminal panicles 2-3.5 cm long, with short primary branches (2 old inflorescences only seen) gray-brown the rachis and branches tomentellous. Bracts and bracteoles small, ca 1 mm long, persistent, tomentellous, ovate-triangular. Receptacle campanulate, tomentellous on exterior, pilose within. Calyx lobes triangular, 1 mm long, acute, reflexed, tomentellous. Petals? (not seen in old flowers present).

Stamens 14-15, inserted around complete circle; exerted beyond calyx lobes; the filaments glabrous, united at base 1.5 mm. Ovary glabrous, inserted at base of receptacle. Style glabrous.

TYPE. *C.L. Lundell* 13023, Mexico, Sinaloa, between Rancho Del Piño and Chele, fl 11 May, 1943 (**Holotype, LL; Isotype, MICH**).

DISTRIBUTION. This species is known only from the type.

Licania mexicana was described from poor material with only old flowers present, and is thus difficult to relate to other species. It belongs to subgenus *Moquilea* either to section *Moquilea* or section *Leptobalanus*, depending on the presence or absence of petals which cannot be observed in the old flowers. It probably belongs to section *Leptobalanus* and seems to be most closely related to the Central American species *L. sparsipilis* Blake. It differs in the inflorescence, the less acuminate leaves with shorter petioles and the greater number of stamens.

Hirtella Linnaeus

1. ***Hirtella magnifolia*** Prance, sp. nov. (Fig. 5)

Ab. *H. elongata* Mart. & Zucc. foliis maioribus, 18-40 cm longis, 8-16 cm latis; nervis primariis 14-18 jugis, petiolis longioribus 5-9 mm longis, latioribus 3.5-6 mm latis; basibus laminarum cum glandibus duobus munitis; inflorescentibus rufo-tomentellis differt.

Tree to 10 m tall, the young branches shortly tomentellous becoming glabrous and conspicuously lenticellate with age. Leaves oblong-elliptic, chartaceous, 18-40 cm long, 8-16 cm broad, abruptly acuminate at apex, the acumen 7-13 mm long, curved, the base rounded; glabrous above, with a few stiff appressed hairs beneath on venation; with 2 glands at junction of upper surface of lamina and the petioles; primary veins 14-18 pairs prominent beneath, prominulous above; midrib prominent beneath, prominulous above, tomentellous on both surfaces; petioles 5-9 mm long, 3.5-6 mm thick, tomentellous, eglandular, terete. Stipules early caducous (not seen).



Fig. 5. *Hirtella magnifolia* Prance (Lleras et al. P17216 1815): A, habit B, flower; C, flower section; D, petal.

Inflorescences terminal panicles with a long central rachis 12-18 cm long and many short few-flowered lateral primary branches, the rachis and branches rufous tomentellous. Bracts and bracteoles ovate, persistent, gray-brown tomentellous on both surfaces, eglandular. Flowers 5-6 mm long. Receptacle campanulate, tomentellous on exterior, glabrous within except for sparsely pilose area around throat. Calyx lobes acute, gray tomentellous on both surfaces. Petals, 5 white, glabrous. Stamens 5-7, unilateral with toothed portion of ring opposite to them, filaments far exceeding calyx lobes, glabrous. Style glabrous. Ovary inserted at mouth of receptacle, pilose. Fruit not seen.

TYPE: Brazil, Amazonas, Rio Javari, Estirão do Equador, flowering 21 Oct, 1976, G.T. Prance, R. J. Hill, T. D. Pennington & J. Ramos 23974 (Holotype INPA; Isotypes, FHO, MO, NY, MG, US).

ADDITIONAL MATERIAL: Brazil, Amazonas, Rio Javari, Estirão do Equador, flowering 2 Aug, 1973, E. Lleras et al P17216 (INPA, NY).

HABITAT: Upland forest on terra firme, understory in open clearings.

Hirtella magnifolia has the largest leaves of any described species of the genus, often attaining 40 cm in length on the fertile branches. It is most closely related to *H. elongata* Mart. & Zucc., and *H. eriantra* Benth. It differs from both species in the larger leaves with a greater number of primary veins. It also differs from *H. elongata* in the rufous tomentellous pubescence of the inflorescence, the 2 glands at the junction of the upper surface of the leaf lamina and petioles; the rounded not subcordate leaf bases; the longer inflorescence branches. It differs from *H. eriantra* in the inflorescence branching and the lamina glands.

The flowers of the type tree of this species were much visited by butterflies at the time of collection, and like some other species of *Hirtella*, *H. magnifolia* is probably butterfly pollinated.

2. *Hirtella revillae* Prance, sp. nov.

(Fig. 6)

Hirtella ab sectio *Myrmecophila* pertinet ab aliis speciebus pedicellis longioribus 8-15 mm longis, hirsutis, floribus dense brunneo-hirsutis differt.

Trees 8 m tall; the young branches hispid. Leaves with laminas chartaceous-membranaceous, oblong, 19-22 cm long, 8-10 cm broad, abruptly acuminate at apex, the acumen 7-10 mm long, rounded at base and bearing 2 swollen ant cavities, hirsute on venation beneath with sparse appressed hairs on upper surface; midrib prominent beneath prominulous above, hirsute on both surfaces; primary veins 13-17 pairs prominent beneath, prominulous above. Stipules linear, persistent, hispid. Inflorescences of axillary racemes 5-6 cm long, the rachis light brown hispid, the lower pedicels longer than the upper ones giving a slightly corymbose appearance. Bracts and bracteoles linear, persistent, hispid. Flowers 8-10 mm long (excluding pedicels). Receptacle campanulate, light brown hispid on exterior, glabrous within even at throat except around base of ovary; pedicels 8-15 mm long. Calyx lobes lanceolate, hispid on exterior. Petals 5, white, glabrous. Stamens 6, the filaments far exceeding calyx lobes. Style hirsute on lower portion only. Ovary inserted at mouth of receptacle, glabrous except around base. Fruit not seen.

TYPE: Peru: Loreto, Maynas, Rio Nanay 4 km from Michana, 150 m alt., fl 10 Jan 1975, A. Gentry, F. Ayala & J. Revilla 15807 (Holotype, NY; Isotype, MO).

HABITAT: Upland forest on white sand, poorly drained, swampy.

Hirtella revillae belongs to the section *Myrmecophila* which previously contained 6 species. It has the swollen ant cavities at the base of the leaves, and the hispid pubescence characteristic of all members of this section. It differs in the very long pedicels and in the distinctive dense hirsute pubescence of the pedicels and flowers, and the glabrous ovary and mouth of the receptacle, and is most closely related to *H. physophora* Mart. & Zucc.

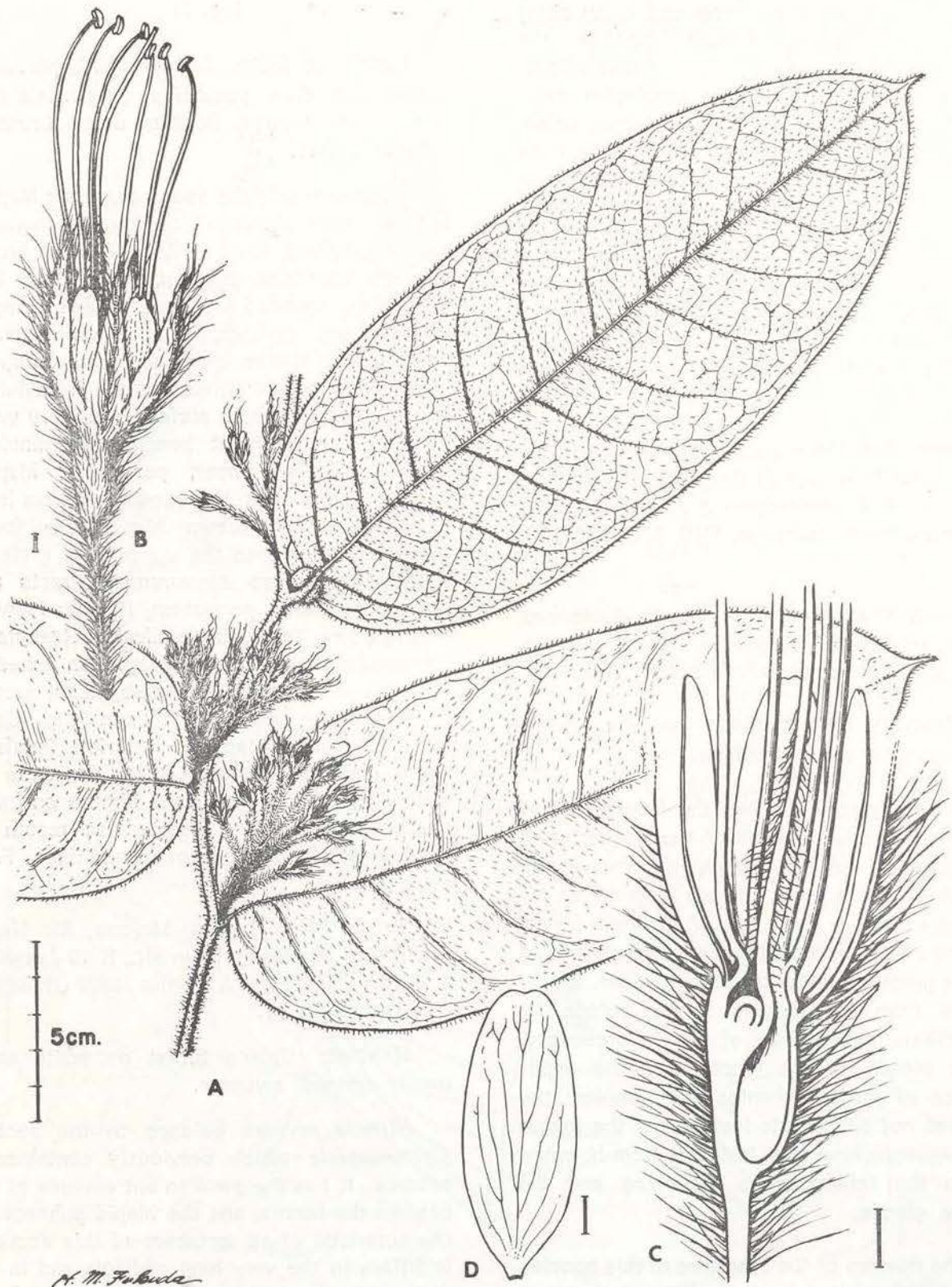


Fig. 6. *Hirtella revillae* (Gentry et al. 15807): A, habit; B, flower; C, flower section; D, petal.

The inflorescence is of rather intermediate length in comparison to other species of section *Myrmecophila* which either have much more compact fasciculate inflorescences or elongate racemes or panicles. Only *H. duckei* has racemose inflorescences as short as *H. revillae* but *H. duckei* differs in many other ways.

This species is named for one of the collectors Juan Revilla of the Flora of Peru Project, one of the promising young collectors of Amazonian Peru.

3. *Hirtella tubiflora* Cuatr.

This species was known only from the type collection from the coastal lowlands of Valle in Colombia at 30-50 m altitude, in the Rio Calima region. Recently two new collection have been made from the wet forests of Panama at about 800 m altitude.

Panama. Panama Prov. Cerro Jefe, J. T. & F. Witherspoon 8543 fl (MO, NY). Veraguas, 3-4 km W of Santa Fe, 2500 ft alt, M. Nee 11288 fl (MO, NY).

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Resumo

Quatro novas espécies do gênero *Licania* e duas de *Hirtella* (Chrysobalanaceae) são descritas. Todas as espécies são baseadas em material coletado após a publicação da monografia da família Chrysobalanaceae em 1972. Três delas são da Amazônia, duas de Panamá e uma da região Pacífica da Colômbia. Este fato vem confirmar que estas áreas ainda são pouco estudadas e necessitam de mais pesquisas. Notas sobre três espécies pouco conhecidas são também apresentadas.

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