

## **A new subspecies of *Magnolia virginiana* (Magnoliaceae) from western Cuba**

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ALEJANDRO PALMAROLA-BEJERANO, MIKHAIL S. ROMANOV & ALEXEY V. F. C. BOBROV

## A new subspecies of *Magnolia virginiana* (*Magnoliaceae*) from western Cuba

### Abstract

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*Magnolia virginiana* was reported recently from the Majaguillar marshes in western Cuba. This was the first Cuban record of the species, formerly considered an endemic of the USA. The Majaguillar population of *M. virginiana* differs in leaf shape and flower features from those of the North American mainland. It is therefore described as a new subspecies, *M. virginiana* subsp. *oviedoae*.

Additional key words: Antilles, *Magnolia virginiana* subsp. *oviedoae*, taxonomy

The number of *Magnolia* taxa known from Cuba rose from the single first described *Magnolia cubensis* Urb. (León & Alain 1951) to 3 species and 8 subspecies in the latest treatment of Cuban magnolias (Imchanitzkaja 1991): *M. cubensis* with subsp. *cubensis*, subsp. *turquinensis* Imkhan. and subsp. *acunae* Imkhan. (Imchanitzkaja 1974), *M. cristalensis* Bisse with subsp. *cristalensis*, subsp. *moana* Imkhan. and subsp. *baracoana* Imkhan., and *M. cacuminicola* Bisse with subsp. *cacuminicola* and subsp. *bissei* Imkhan. All except *M. cubensis* subsp. *acunae*, endemic to the Guamuhaya massif in C Cuba, are restricted to the mountains of E Cuba. Bisse (1974) had four species instead of the current three, but he later (Bisse 1988) acknowledged that his *M. leonis* “Tujanitskaya” (an error for Imchanitzkaja) was the same as *M. cubensis* subsp. *acunae*.

Oviedo & al. (2008) published the first record of a native *Magnolia* for W Cuba: *M. virginiana* L. They had discovered this species, formerly considered an endemic of the USA (Treseder 1978; Calaway 1994; Meyer 1997), in the Majaguillar marshes in the municipality of Martí, province of Matanzas.



Fig. 1. Holotype specimen of *Magnolia virginiana* subsp. *oviedoae* (HAJB).



Fig. 2. *Magnolia virginiana* subsp. *oviedoae* – A: flower; B: fruit. – Photographs by L. R. González-Torres.

Upon closer study we now propose recognition of the Cuban population of *Magnolia virginiana* as a new subspecies, morphologically distinct from both North American subspecies, *M. virginiana* subsp. *virginiana* and subsp. *australis* (Sarg.) A. E. Murray.

***Magnolia virginiana* subsp. *oviedoae*** A. Palmarola, M. S. Romanov & A. V. Bobrov, **subsp. nov.**  
 Holotype: Cuba, Prov. Matanzas, Municipio Martí, Ciénaga de Majaguillar, camino de la Alameda a la Ciénaga de Gonzalito, 8.10.2006. *Oviedo, Palmarola & González-Torres HFC 84055* (HAJB; isotypes: B, HAJB, JE; other isotypes [same taxon, same locality, same date, same collectors] under the numbers *HFC 84056*: B, HAJB, JE; *84057*: B, HAJB; *84058*: HAJB; *84059*: B, HAJB). – Fig. 1.

Frutex sempervirens paluster, ad 7 m altus, truncis pluribus; ramuli hornotini et pagina inferior foliorum pilis argenteis deciduis ± sparsis oblecta; foliorum lamina anguste elliptica vel lanceolata, 7.5-17 × 2.3-5 cm, basi cuneata, apice acutata; flores parvuli, sepalis subloriformibus, petalis anguste obovatis; gynoecium et fructus anguste cylindracei.

Evergreen many-stemmed shrub about 4-7 m high, with a crown diameter of up to 10 m. Young branches and underside of leaves covered with ± sparse silvery hairs, usually persisting for a short time on fully grown branches and sometimes for nearly one year on the shoots. *Leaf blade* lanceolate or narrowly elliptic, 7.5-17 × 2.3-5 cm, medium green above, glaucous beneath; base narrowly cuneate, apex narrowly acute. *Flower buds* protected by pubescent bud scales. *Flowers* (Fig. 2A) smallish, with 3 almost ribbon-shaped, greenish white sepals with a rounded tip and 7-8(-9) narrowly obovate petals; stamens numerous, flattened, acute, pollen pale or whitish; gynoecium and fruit (a polyfollicle: Fig. 2B) narrowly ellipsoidal or cylindrical.

Both *Magnolia virginiana* subsp. *virginiana* and subsp. *australis* have broader, elliptic leaves with a more broadly cuneate base and cuneate acute tip, larger flowers with wider sepals and petals, and a broader spheroid-cylindrical or ellipsoidal gynoecium and fruit. The former, which is



Fig. 3. Distribution of *Magnolia virginiana* subsp. *oviedoae*.

also a shrub, has deciduous leaves. The latter always grows as a single-stemmed tree in water-logged areas (only on poor, thin soils it may occasionally develop additional stems as a result of damage), and the silvery pubescence of the branches and leaf underside is denser, persisting during one or more seasons.

*Eponymy.* – The new subspecies is named after the Cuban botanist Ramona Oviedo Prieto, curator of the herbarium HAC, who discovered this population.

*Distribution.* – Only known from the type locality (Fig. 3).

*Habitat.* – The plants grow in small mounds within the swamp grassland and in the ecotone areas between swamp grassland and swamp forest.

*Other specimens seen.* – Cuba, Prov. Matanzas, Municipio Martí, Ciénaga de Majaguillar, Ciénaga de Gonzalito, 19.2.2006, *Oviedo, Blanco & Muñoz SV 42997* (HAC, HAJB); *ibid.*, al NO de Martí, Ciénaga de Gonzalito cerca del Canal de Blanquizar, bosque secundario de ciénaga, alt. 5 m, 10.-11.2.2007, *Palmarola, González-Torres & Cruz HFC 84667, 84668, 84669, 84670, 84672* (HAJB), *84671, 84674* (B, HAJB), *84673* (B, HAJB, JE); *ibid.*, 22°59'45"N, 80°58'45"W, bosque secundario de ciénaga, flores color crema, 27.2.2007, *Greuter, Palmarola & Rankin 26651* (B, HAJB, JE, PAL-Gr); *ibid.*, Ciénaga de Gonzalito, 21.3.2007, *Palmarola, Romanov, Bobrov & Pérez-Montesino HFC 84633* (HAJB).

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