



## A new species of *Villaria* (Octotropideae, Rubiaceae) from Luzon, Philippines including its conservation status

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### Abstract

*Villaria uniflora*, a new species from the Philippines is here described and illustrated. It can be easily distinguished from other members of the genus by its uniflorous inflorescences, narrowly acute bract apex, infundibuliform calyx tube, triangular-ovate calyx lobes, and lanceolate stigmatic lobes.

### Introduction

The Philippine archipelago is considered as one of 10 megabiodiversity hotspots (Myers 1988, Myers et al. 2000). It is a part of the Malesian region, which is considered as one of the great centers of tropical plant diversity. According to Alejandro (2007), the largest number of indigenous plant species in the Philippines belongs to the family Rubiaceae. In the most recent global assessment of Rubiaceae, the Philippines ranked third among the 20 areas with the highest number of endemic species, and ranked among the 20 most diverse regions for Rubiaceae based on total number of species (Davis et al. 2009). These rankings might change considerably as result of several current nomenclatural and taxonomic revisions, and an ongoing project on Rubiaceae of the Philippines (Alejandro & Liede-Schumann 2003). In the recent floristic study at Mts. Palaypalay and Mataas na Gulod National Park, Ternate, Cavite, Philippines, an unknown interesting species of Rubiaceae was collected. The presence of the paired axillary inflorescences, hermaphroditic flowers, contorted corolla aestivation, numerous ovules, drupaceous fruits and fibrous exotestal cells indicate that is a member of the tribe Octotropideae (Robrecht 1980, 1988, Bridson & Verdcourt 2003, Ruhsam & Davis 2007, Alejandro *et al.* 2011). In the Philippines, the only recorded members of the tribe are *Hypobathrum* Blume (1826: 1007) and *Villaria* Rolfe (1884: 311); the latter being endemic to the country (Alejandro 2007). The presence of densely pubescent bracts and calyces, pilose at the inner side of stipules, and unilocular ovary with parietal placenta, horizontal ovules and densely pubescent stigmas reveals that our species belongs to *Villaria* (Mulyaningsih & Ridsdale 2004, Alejandro *et al.* 2011). A thorough evaluation of our materials shows no match with any currently recognized *Villaria* species *sensu* Alejandro *et al.* (2011) namely: *V. acutifolia* (Elmer) Merrill (1910: 248), *V. fasciculiflora* Quisumb & Merrill (1928: 207), *V. glomerata* (Bartlett ex A. de Candolle) Mulyan & Ridsdale (2004: 195), *V. leyetensis* Alejandro & Meve (2011: 16) and *V. odorata* (Blanco) Merrill (1918: 363). Molecular data from *rps16* and *trnL-F* markers (Arriola & Alejandro, unpub.) also support the placement of this species in the *Villaria* clade. Therefore, the new species of *Villaria* is described and illustrated below.