

Coelogyne ventrinigra (Orchidaceae), a new species from Thailand

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ABSTRACT

Coelogyne ventrinigra, a new species from Umphang District, Tak Province, in the western part of Thailand, is described and illustrated.

KEYWORDS: *Elatae*, Conservation status.

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INTRODUCTION

In 2009, Mr Kamol Kitiwattanabunrung found a plant of a white flowered *Coelogyne* Lindl. species with two elongate brownish-black blotches on the abaxial surface of the lip. It was growing on a fallen tree in evergreen hill forest at ca 1700 m above sea level in Mogro Subdistrict, Umphang District, Tak Province, Thailand. A specimen was collected and deposited in the Queen Sirikit Botanic Garden Herbarium (QBG). More recently, a specimen was collected by another nature photographer, Mr Chaiwat Tunkpradit, from a different mountain peak in Mogro Subdistrict, and was deposited in the Forest Herbarium (BKF). These specimens belong to the section *Elatae* Pfitzer & Kraenzl. but they do not match any known species in the genus *Coelogyne*, and are therefore described and illustrated here as a new species.

Coelogyne is a genus of more than 200 species distributed throughout South and Southeast Asia, Malesia, and the western Pacific islands to Samoa, with its main area of speciation in mainland SE Asia and the western Malesian Archipelago (Clayton,

2002; George & George, 2011). It is subdivided in 22 sections. For Thailand 36 species have been recorded, including the present species, from 12 sections. *Coelogyne ventrinigra* belongs in sect. *Elatae*, which now contains 15 species of which 4 species occur in Thailand (Pedersen *et al.*, 2014). Sect. *Elatae* is restricted to mainland Southeast Asia, where it has been recorded from India, Nepal, Myanmar, Bhutan, Thailand, Peninsular Malaysia, Laos, Vietnam and China (Clayton, 2002; George & George, 2011).

DESCRIPTION

***Coelogyne ventrinigra* de Vogel, Suksathan & Boonnuang sp. nov.**

This species is distinguished from others in the section by the relatively short and wide, transversely elliptic mid-lobe, which is less than 1/4th of the length of the entire lip; by the lateral lobes enveloping the column; and by having adaxially on the lip two almost black spots, which in combination resemble a coffee bean, whereas abaxially the corresponding blackish spot is undivided. The only other species

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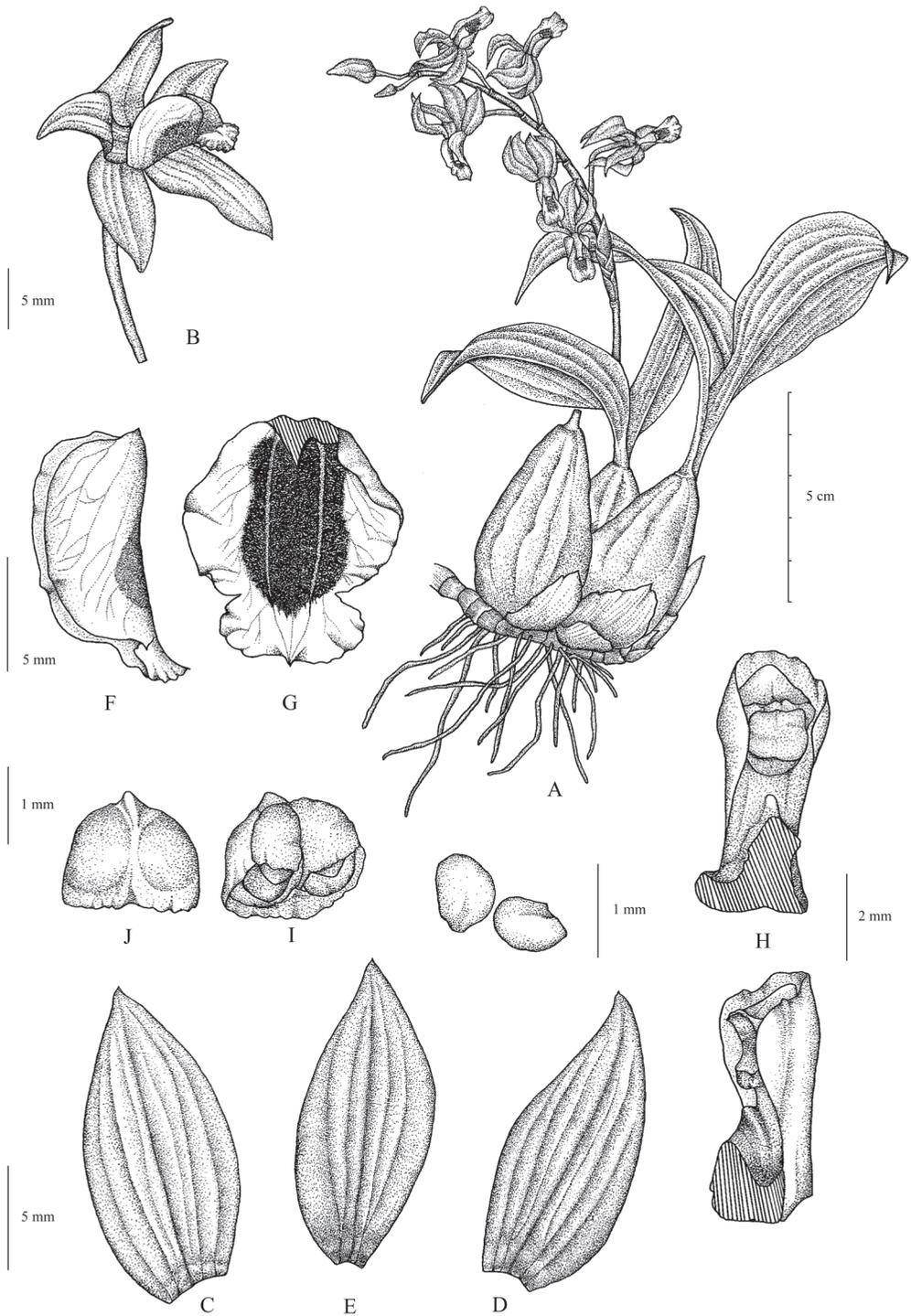


Figure 1. *Coelogyne ventrinigra* de Vogel, Suksathan & Boonneung. A. habit; B. flower side view; C. dorsal sepal; D. petal; E. lateral sepal; F. labellum side view; G. labellum adaxial surface; H. column front view and side view; I. operculum from below; J. operculum from above; K. pollinia. All from *Tunkpradit 01* (BKF). Drawn by T. Pingyot.

with a relatively short lip mid-lobe is the Indian *C. griffithii* Hook.f., but this has a quadrangular mid-lobe slightly less than $1/3^{\text{rd}}$ of the length of the entire lip, and has lateral lobes which do not envelop the column, while the flowers are pale brownish with a white lip, with the lateral lobes adaxially pale brownish. Type: Thailand. Tak Province, Umphang District, Mogro Subdistrict: ca 1700 m alt., 17 Feb. 2009, *Boonnuang & Kitiwatthanabunrung s.n. QBG-37091* (holotype **QBG**, isotype **BKF**). Figs. 1–2.

Pseudobulbs 1.5–3 cm apart, ovoid to elongated ovoid, angular to grooved, $4.5\text{--}5.5 \times 2\text{--}2.4$ cm. *Leaves* 2, rather leathery; petiole $8\text{--}10 \times 4$ mm; lamina ovate to lanceolate, $8\text{--}10 \times 2.7\text{--}4$ cm; apex acuminate; midrib prominent. *Inflorescence* hysteranthous; peduncle erect, terete, $7.5\text{--}10 \times \text{ca } 0.2$ cm; rachis rigid, slightly curved, 8–16 cm long, its base enclosed by ca 1–3 persistent, imbricate, leathery scale leaves; internodes 1–1.3 cm long. *Floral bracts* caducous. *Flowers* 9–12, most opening simultaneously, 2–3 cm in diam., glabrous; all parts white except labellum

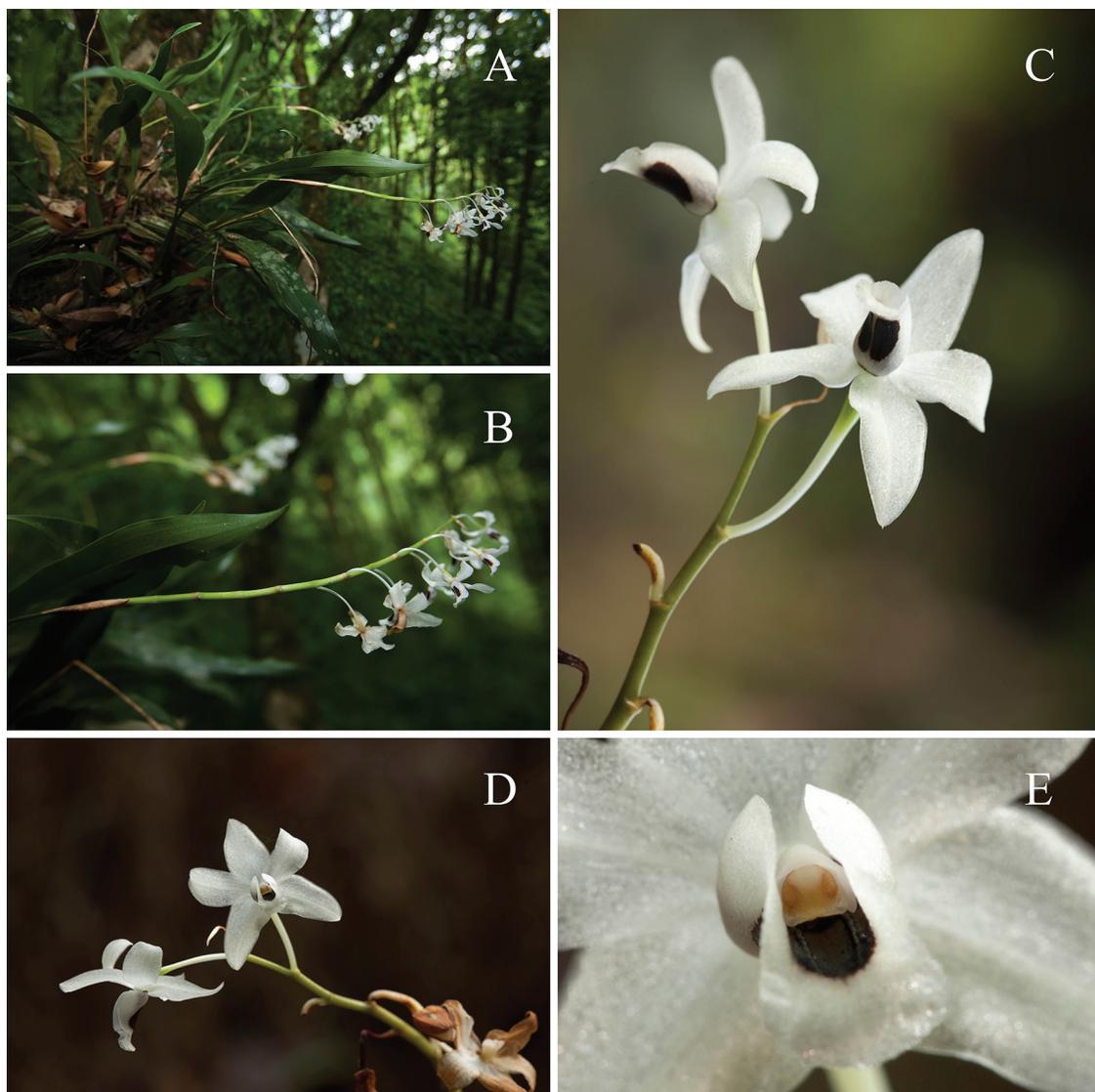


Figure 2. *Coelogyne ventrinigra* de Vogel, Suksathan & Boonnuang, A. flowering plant in habitat; B. inflorescence; C. flower with brownish-black spots on labellum; D. flower front view. E. close-up of labellum. Photos by H. Boonnuang.

abaxially with 2 brownish-black blotches, and adaxially on the hypochile with a single large dark brown blotch. *Dorsal sepal* more or less patent, ovate, 15–16 × 7–8 mm, apex mucronate. *Lateral sepals* patent, lanceolate, 15–16 × 7–8 mm, apex mucronate. *Petals* patent, oblong, 14–15 × 6–7 mm, apex mucronate. *Labellum* weakly 3-lobed, 12–13 × ca 10 mm; lateral lobes enveloping the column, in front projecting, apex rounded; mid-lobe recurved, when flattened transversely elliptic, ca 3 × 5 mm, apex truncate, acutely apiculate; keels 2, from base to almost top of hypochile, less than 1 mm high, margin erose. *Column* short, ca 6 mm long; apex rounded.

Thailand.— NORTHERN: Tak [Umphang District, Mogro Subdistrict ca 1700 m alt., 17 Feb. 2009, *Boonnuang & Kitiwatthanabunrung s.n. QBG-37091 (QBG, BKF)*; 21 Feb. 2016, *Tunkpradit 01 (BKF!)*].

Distribution.— Endemic.

Phenology.— Flowering: February.

Ecology.— Epiphytic in hill evergreen forest, 1700–2100 m altitude.

Conservation status.— *Coelogyne ventrinigra* has been found in 2 populations in the same mountain range within 10 km distance in a relatively little-disturbed area. As it is rather common in the area, its conservation status should be assessed as Least Concern (LC), following the IUCN Red Listing criteria (IUCN2012)

Vernacular.— Ueang nang phaya lin dam (เอื้องนางพญาลินดำ).

Etymology.— The epithet *ventrinigra* means ‘black belly’, from the Latin *venter* (belly), and *nigra* (black), referring to the blackish spots abaxially on the lip.

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