

## SELLIGUEA SRI-RATU, A NEW SPECIES IN POLYPODIACEAE

P. H. HOVENKAMP

Rijksherbarium / Hortus Botanicus, Leiden, The Netherlands

### INTRODUCTION

In a revision of the Malesian representatives of the genus *Selliguea* (Polypodiaceae) several recently collected specimens from Borneo were found to represent a very distinct, but hitherto undescribed species. From the few collections seen so far, it appears that the new species is not a very narrow endemic, and the fact that it has only been collected after 1970 probably is an indication of the increasingly intensive exploration of Borneo in recent times.

In so far as the specimens had been identified, the names *S. feei* Bory and *S. heterocarpa* (Blume) Blume had been applied. In general habit, the species is closest to *S. heterocarpa*, but can be distinguished by the following characters:

*Selliguea heterocarpa* — Rhizome 2–4 mm thick; rhizome scales peltate, 5–8.5 by 1–1.4 mm, straw-coloured to dull brown, with a thick, almost spongy pseudocosta, remotely and weakly dentate at base, entire towards the apex. Hydathodes frequent, margin without notches. Sori forming transversal coenosori, slightly to (usually) deeply sunken.

*Selliguea sri-ratu* — Rhizome 4–8 mm thick; rhizome scales pseudopeltate, 7–13 by 1.2–2.5 mm, brown, without pseudocosta, strongly dentate. Hydathodes absent or infrequent, margin regularly notched. Sori round, elongated or sometimes confluent into a transversal coenosorus, superficial.

### *Selliguea sri-ratu* Hovenkamp, *spec. nov.*

*Selliguea heterocarpa* similis, ab eo differt squamis rhizomatis pseudopeltatis, grandis, valde dentatis; soris rotundatis vel elongatis, seriatim inter costam et marginem. — Typus: *Iwatsuki et al. B2497* (L. holo; BO iso), Indonesia, Borneo, G. Mendam.

*Rhizome*: 4–8 mm diam., phyllopodia contiguous or internodia to 0.8 cm long. Vascular strands 7, bundle sheath hyaline. Sclerenchyma strands many, scattered, isodiametric, massive. Ground tissue not sclerified. *Rhizome scales* pseudopeltate, spreading, 7–13 by 1.2–2.5 mm, acute, brown, evenly coloured (often with a weak pseudocosta), strongly dentate. *Fronndimorphy*: sterile fronds absent or present; fertile parts similar to sterile part or narrowed. *Fertile fronds*: simple. Stipe 7–16 cm long. Lamina 14–22 by 2.8–5.5 cm or longer, index 4.2–6.1, widest at 0.3–0.6 from base. *Sterile fronds*: simple. Stipe 7.5–18 cm long. Lamina 16.5–22 by 3.4–5.9 cm, index 3.7–5.5, widest at 0.3–0.5 from base. Main veins on upper surface raised, distinct; veinlets free and anastomosing; free veinlets excurrent and recurrent.

Hydathodes absent, or infrequent (see note 2), calcareous scales not persistent. Margin cartilaginous, flat or thickened; notches regularly present. *Sori* round, elongated or confluent across connecting veins to a transversal coenosorus; in one row, or occasionally in two rows between adjacent main veins, in 2–4 rows between costa and margin; 2–3 mm across; superficial.

**Etymology** — Named to commemorate the opening of the Van Steenis Building by Her Majesty Queen Beatrix on June 11, 1996. The specific epithet refers to the Indonesian word for 'honourable' (= sri) and 'Queen' (= ratu).

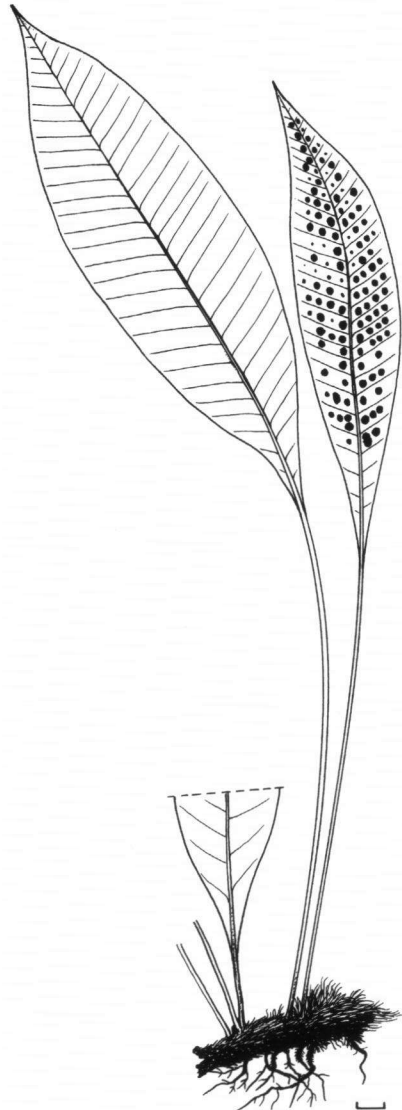
**Distribution** — Borneo.

**Habitat & Ecology** — Epiphytic, in forest; 660–960 m altitude.

**Notes** — 1. At first sight similar to *S. heterocarpa*, but easily distinguished by the strongly dentate, pseudopeltate rhizome scales and the only occasionally confluent sori. *Selliguea sri-ratu* is known from a few, comparatively recent collections only.

2. Apparently, hydathodes are present in sterile fronds only. However, the number of sterile fronds in the specimens seen is very small.

**Specimens studied.** — BORNEO. J. A. R. Anderson S 30805, S 30895; Iwatsuki et al. B 2445, B 2497; Johns 6765; Maskuri 851.



*Selliguea sri-ratu* Hovenkamp. Scale bar = 1 cm.