

**SARACA TUBIFLORA, A NEW SPECIES FROM WEST-CENTRAL SUMATRA
(CAESALPINIOIDEAE)**

W. J. J. O. DE WILDE

Rijksherbarium, Leiden, The Netherlands

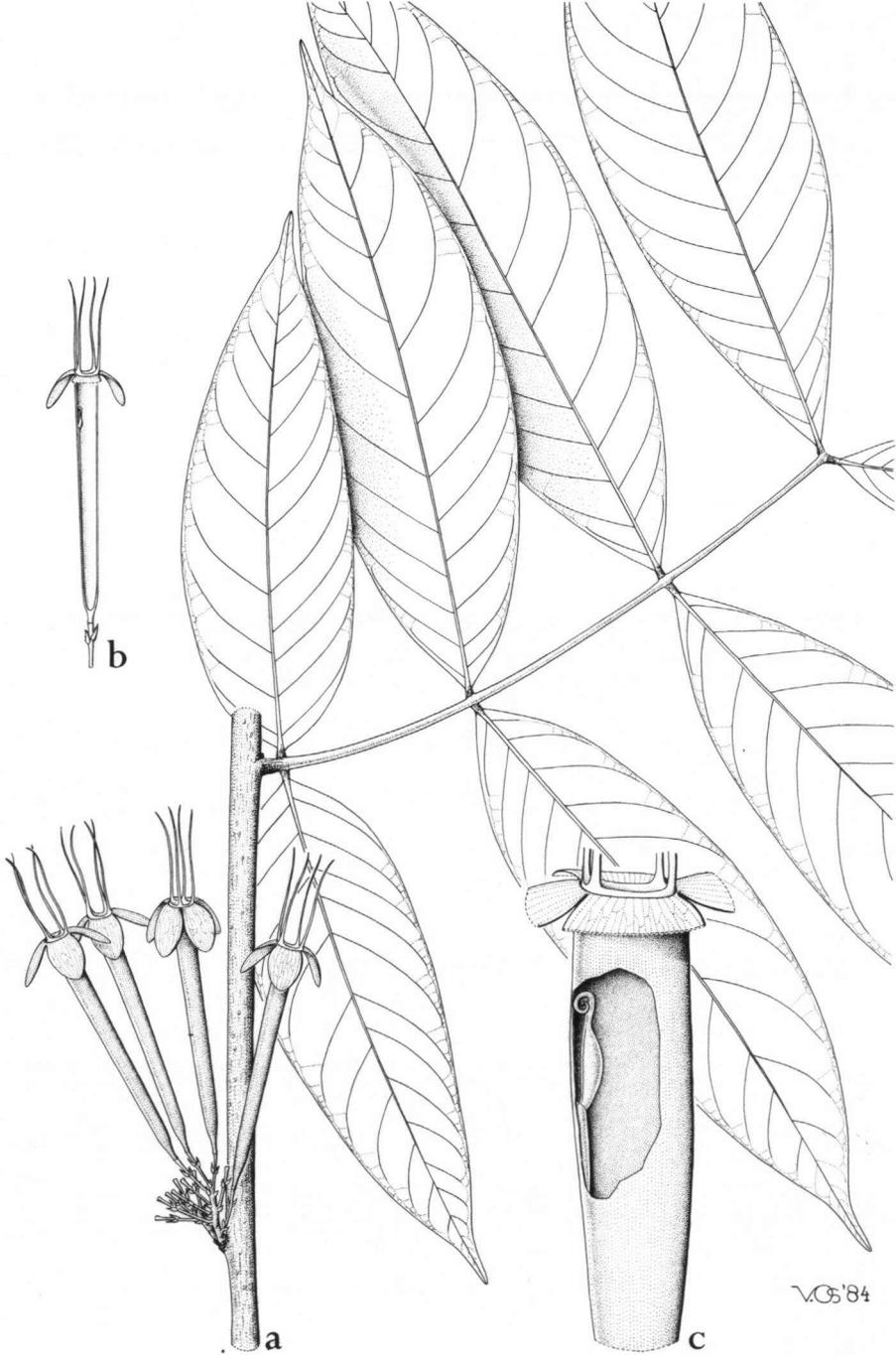
***Saraca tubiflora* de Wilde, *spec. nov.* – Fig. 1.**

Saraca staminibus 4 fertilibus, filamentis liberis, 21–25 mm longis; staminodia desunt; tubo calycis 55–70 mm longo, fauce 4–5 mm lata; bracteis atque bracteolis persistentibus, erecto-patentibus, 2–3 mm longis. – *T y p u s* : *de Vogel 3008* (L; iso BO).

Shrub c. 1 m tall. *Leaves* 2–4-jugate, glabrous, subsessile, top of rhachis without free appendage; *leaflets* membranous, drying olivaceous, oblong to oblong lanceolate, at base short-attenuate, top acuminate, 13–22 × 4.5–8 cm, the basal leaflets smallest; basal and apical glands present, very minute. *Corymbs* glabrous, rather compact, including flowers c. 7–9 cm diam., consisting of 2 or 3 racemose main branches each 2–2.5 cm long, at base c. 1.5 mm diam., each with c. 10 flowers; these dispersed, the pedicels of the lowermost flowers longest, 10–17 mm long; *bracts* ovate-triangular to long-triangular, glabrous with finely remotely-fimbriate margin (fimbriae c. 0.2 mm), 2–3 mm long, persistent; bracteoles of about the same size as the bracts, long-triangular to oblong, top acute or bluntish, glabrous, with minutely fimbriate edge, 2–3 mm long, rather erecto-patent and more or less clasping the pedicel, not spreading. *Flowers* somewhat fleshy, glabrous; pedicel stoutish, 10–17 mm, the bracteoles inserted 4–6 mm below the calyx tube; calyx tube 55–70 mm long, gradually tapering to the base, 4–5 mm wide at the throat, base articulated; calyx lobes 4, broadly ovate-elliptic, 10–13 × 5–9 mm. Perfect stamens 4, inserted in the throat, at base united by a very low rim (or 'disc') c. 0.5 mm high, staminodes absent; filaments 21–25 mm long, deleted towards the base; anthers not seen (see notes). Vestigial *pistil* (present only in some flowers) glabrous, vestigial ovary c. 3 mm long, with a c. 2 mm long coiled style with minute stigma; fertile pistil not seen. *Pod* not seen.

SUMATRA. West Sumatra, Barisan Range, Ribo Panti Nature Reserve, 0°–20' S, 100°–04' E: *de Vogel 3008*.

Ecology. Collected as a solitary shrub in rather undisturbed primary forest 40 m high, with some undergrowth, on hill ridge, deep clayey soil, terrain sloping to steep; 300–500 m altitude. Flowers 19 March 1974.



Notes. 1. Fieldnotes. Solitary shrub 1 m high. Flower tubes yellowish red, along the rim orange-yellow, tepals dark red, anthers violet.

2. The anthers are recorded as violet on the field label, but unfortunately none are present in the L-specimen.

3. This is obviously a new species of *Saraca*, although only represented by a single, rather scant collection. It is very distinct by its large flowers with remarkably long perianth tube.

4. Flowers with fertile-looking pistil are not seen. In the type specimen 13 flowers are present and most of these are completely male, without a trace of a pistil; some flowers have a vestigial pistil (Fig. 1b, c).

5. With this species presently 10 or 11 species are recognized in *Saraca*. The present new species, in the group with 3–5 stamens and with small bracts, fits in the key presented by Zuyderhoudt (Blumea 15, 1967, 415) and extended by De Wilde (Blumea 27, 1981, 237) as follows:

KEY TO THE SPECIES

- | | |
|---|--|
| 1a. Stamens 3–5(–6) | 2 |
| b. Stamens 6–10 | 8 |
| 2a. Bracts large, 12–35 mm long, fugacious. Bracteoles oblong-lanceolate, acute, 6–17 mm long, fugacious. Main branches of corymb 3–10 mm diam.; corymb up to c. 35 cm diam. Tonkin to S. Burma, Malaya, Java | |
| | S. thaipingensis Cantley ex Prain |
| b. Bracts small, less than 12 mm long, fugacious or persistent. Bracteoles ovate-oblong(-lanceolate), with rounded or acute apex, 1.5–19 mm long, fugacious or persistent. Main branches or corymb up to c. 3 mm diam.; corymb up to c. 20 (–25) cm diam. | 3 |
| 3a. Bracteoles 1–3 mm long | 4 |
| b. Bracteoles 4–19 mm long | 6 |
| 4a. Bracts and bracteoles fugacious. Central Celebes | S. celebica de Wilde |
| b. Bracts and bracteoles persistent, clasping the pedicel | 5 |
| 5a. Calyx tube 12–15 mm long, at throat c. 2 mm wide. Length of pedicel between calyx tube and bracteoles c. 10–14 mm. Ovary pubescent. Upper Burma, W. Yunnan | S. griffithiana Prain |
| b. Calyx tube 55–70 mm long, at throat 4–5 mm wide. Length of pedicel between calyx tube and bracteoles 4–6 mm. Ovary glabrous. West-Central Sumatra | |
| | S. tubiflora de Wilde |

Fig. 1. *Saraca tubiflora* de Wilde. a. Habit of twig with leaf and inflorescence, $\times \frac{1}{2}$; b. flower, drawn opened, showing vestigial pistil, calyx tube hollow to the base, and pedicel with persistent bracteoles; anthers fallen off, $\times \frac{1}{2}$; c. ditto, showing glabrous vestigial pistil, $\times 3$ (a–c. *de Vogel* 3008, type).

- 6 a. Calyx tube 18–23 mm long, at the throat 4–5 mm wide. Stamens and staminodes at base united into a tube 4–9 mm long. Flores, Halmahera
S. monadelpha de Wilde
 - b. Calyx tube at throat up to 2 mm wide. Stamens free, inserted on a ‘disc’ up to c. 1 mm long 7
- 7 a. Calyx tube short, up to c. 7 mm long. Fruits subcircular to oblong, up to c. 8 cm. Twigs and rhachis of leaves whitish; leaflets blackish brown when dry. Borneo
S. hullettii Prain
 - b. Calyx tube long, (5–)7–32 mm long. Fruits oblong-lanceolate, 7–31 cm long. Twigs and rhachis of leaves generally not whitish; leaflets drying generally not blackish brown. Burma, Thailand, Laos, Cambodia, Vietnam, Malaya, Sumatra, Borneo, once in Java* **S. declinata** (Jack) Miq.
- 8 a. Bracts and bracteoles large, 12–35 and 6–17 mm long respectively, the bracts fugacious. Main branches of corymb 3–10 mm diam.; corymb (8–)15–35 cm diam. 9
 - b. Bracts and bracteoles small, 1–8 and 2–8 mm long respectively, the bracts mostly persistent. Main branches of corymb up to 3 mm diam.; corymb 1.5–15(–20) cm diam. 10
- 9 a. Bracteoles fugacious. Stamens 6; anthers 2 mm long. Tonkin to S. Burma, Malaya, Java **S. thaipingensis** Cantley ex Prain
 - b. Bracteoles persistent. Stamens 8–10; anthers 3–3.5 mm long. Laos, Vietnam
S. dives Pierre
- 10 a. Bracteoles erect, clasping the pedicel, persistent. Ceylon, India, Bangladesh, Burma; only west of the Irrawaddy River; otherwise cultivated
S. asoca (Roxb.) de Wilde
 - b. Bracteoles spreading, persistent or fugacious. Thailand, Malaya, Sumatra, Java; not west of the Irrawaddy River **S. indica** L.

* *Saraca schmidiana* J.E. Vidal, Fl. Camb., Laos et Vietnam 18 (1980) 130, pl. 23 f. 5–6, differs by slender inflorescences and early fugacious bracts and bracteoles. I have not seen original material.