

## 5. PORANOPSIS Roberty, Candollea 14: 26. 1952.

白花叶属 bai hua ye shu

Lianas, dull yellow or grayish villous or sericeous, glabrescent. Leaves simple, petiolate, cordate-ovate, papery, rugulose, abaxially densely pubescent; venation pedate or nearly palmate. Inflorescences axillary (or terminal) bracteate panicles; bracteoles 2, scalelike, basal to calyx. Pedicel filiform. Flowers tiny, often fragrant, fascicled. Sepals free, quincuncial, unequally enlarged, outer 3 greatly enlarged, inner 2 slightly so; midvein 1, secondary veins reticulate. Corolla white, ± funnelform, less than 8 mm; limb 5-lobed, outside villous apically, inside glabrous. Stamens included or exserted; anthers ellipsoid, longitudinally dehiscent; pollen 3-colporate, not spiny. Disc ringlike or absent. Pistil included; ovary unilocular; ovules 4. Style simple (nearly absent in 1 species); stigma 2-globose. Fruit papery, indehiscent. Seed 1, smooth.

Three species: Bhutan, China, India, ?Laos, Myanmar, Nepal, Pakistan, N Thailand, Vietnam; all three species in China.

Fang Rhui-cheng believes that *Poranopsis* should be reduced to synonymy of *Porana*.

*Poranopsis paniculata* is grown as an ornamental in many tropical places, including S Yunnan.

- 1a. Plants in flower.
  - 2a. Style very short, stigma subsessile; stamens ± equal ..... 2. *P. paniculata*
  - 2b. Style longer than ovary; stamens unequal.
    - 3a. Longest stamens exserted from corolla ..... 1. *P. discifera*
    - 3b. Longest stamens included within corolla ..... 3. *P. sinensis*
- 1b. Plants in fruit.
  - 4a. Outer 3 sepals ovate-cordate to nearly circular; fruit glabrous or with a few hairs near apex only ..... 3. *P. sinensis*
  - 4b. Outer 3 sepals ovate to elliptic-oblong; fruit uniformly puberulent.
    - 5a. Sepals ± shiny, glabrous adaxially; fruit trichomes simple, septate ..... 1. *P. discifera*
    - 5b. Sepals opaque, puberulent adaxially; fruit trichomes 2-armed ..... 2. *P. paniculata*

**1. Poranopsis discifera** (C. K. Schneider) Staples, Novon 3: 200. 1993.

搭棚藤 da peng teng

*Porana discifera* C. K. Schneider in Sargent, Pl. Wilson. 3(2): 358. 1916; *Cardiochlamys discifera* (C. K. Schneider) C. Y. Wu.

Climbers; indumentum yellowish to rust colored. Stems appressed pubescent, glabrescent. Petiole 2.1–5 cm; leaf blade broadly ovate-cordate to nearly circular, 5.8–13 × 4–10.5 cm, smooth to slightly rugulose, abaxially densely villous. Panicles crowded; bracts ovate, leaflike, small to very small. Pedicel 3–5 mm, elongating in fruit. Sepals lanceolate-ovate, flat or concave, ± equal, 1–1.5 mm; inner 2 falcate, villous abaxially. Fruiting calyx spreading, pale tan to brownish; outer 3 sepals ovate-oblong to elliptic-oblong, 1.5–2.2 × 0.7–1.3 cm, ± puberulent abaxially, margin free. Corolla white or cream, campanulate-funnelform; limb 3–5 mm in diam., 5-lobed, outside dull yellow villous distally. Stamens unequal, 3 exserted; filaments basally pubescent. Disc ringlike. Ovary velutinous. Style longer than ovary. Fruit dark brown, globose-ovoid, 4–6(–8) × 3–5 mm, dull yellow pilose, apiculate. Seed reddish to black-brown, globose, ca. 3 mm in diam., smooth, glabrous or puberulent, glabrescent. Fl. Sep-Dec, fr. Dec-Apr.

Often on calcareous soils, clearings of evergreen forests, thickets, scrub jungle, river banks, roadsides, margins of cultivated land; 300–1800 m. Sichuan, Yunnan [NE India, ?Laos, N Myanmar, N Thailand, Vietnam].

**2. Poranopsis paniculata** (Roxburgh) Roberty, Candollea 14: 26. 1952.

圆锥白花叶 yuan zui bai hua ye

*Porana paniculata* Roxburgh, Pl. Coromandel 3: 31. pl. 235. (1815) 1819; *Dinetus paniculatus* (Roxburgh) Sweet.

Climbers; indumentum grayish to dull yellow. Stems puberulent, glabrescent. Petiole 2.6–10.8 cm; leaf blade cordate-circular, 7.5–16.5 × 5.3–15 cm, smooth to rugulose, abaxially silvery villous. Panicle crowded; bracts cordate. Pedicel 2–4 mm, elongating in fruit. Flowers (4–)5–6(–7) mm. Sepals lanceolate-linear, flat or concave, equal, 1–2 mm, tomentose-villous abaxially. Fruiting calyx tan, reddish, or pale brown, loosely clasping; outer 3 sepals elliptic-oblong to narrowly ovate, 1.6–2.2(–2.4) cm × 7–9 mm, puberulent, margin free. Corolla white to cream, narrowly funnelform; limb (3–)5–7 mm in diam., 5-lobed. Stamens included, ± equal; filaments glabrous. Disc absent or ringlike. Ovary glabrous. Style obsolete; stigma subsessile. Fruit tan to brownish with darker lines, globose-ellipsoid, 5–6(–7) × 4–5 mm, pubescent, apiculate. Seeds dark brown, globose-ellipsoid, 4–6 × 3–5 mm, glabrous. Fl. Oct-Dec, fr. Mar-Apr. 2n = 26.

Various soils, forests, thickets, scrub, open plains, often around human habitation; 0–2000 m. Xizang, Yunnan [Bhutan, India, Myanmar, Nepal, Pakistan].

Widely though sparingly cultivated in tropical and subtropical regions, including Yunnan. A single seemingly indigenous collection from the Chinese side of the border between Xizang and Arunachal

Pradesh, NE India, has been seen.

**3. *Poranopsis sinensis* (Handel-Mazzetti) Staples, Novon**  
3: 200. 1993.

白花叶 bai hua ye

*Cardiochlamys sinensis* Handel-Mazzetti, Akad. Wiss. Wien Sitzungsber., Math.-Naturwiss. Kl., Abt. 1, 57: 241. 1920; *Porana henryi* Verdcourt.

Climbers; indumentum dull yellow. Stems sericeous, glabrescent. Petiole 1.6–4.9 cm; leaf blade ovate-cordate, 6.3–9.5 × 3.6–7.8 cm, smooth or rugulose, dull yellow to reddish pubescent. Panicle lax; bracts ovate-oblong. Pedicel 3–6 mm, elongating to 8 mm. Flowers 4.5–6(–7) mm. Sepals broadly ovate to linear-filiform, equal, 1–2 mm, tomentose abaxially. Fruiting calyx tan to brown, clasping; outer 3 sepals ovate-cordate to nearly circular, (1.2–)1.4–1.9 × (1.2–) 1.5–1.7 cm, sparsely puberulent abaxially, margin adherent below middle. Corolla white to cream, campanulate-funnelform; limb 4–6(–7) mm in diam., subentire, dull yellow sericeous outside. Stamens unequal, 2 reaching throat, 3 included; filaments villous basally. Disc ringlike or absent. Ovary glabrous or sparsely villous. Style longer than ovary. Fruit tan brownish with darker lines, ellipsoid-obovoid, 3.5–6 × 2.5–4 mm, glabrous or sparsely pubescent, apiculate. Seeds brownish to black, ellipsoid-globose, 3–4 × ca. 3 mm, glabrous. Fl. Oct-Dec, fr. Nov-Feb.

- Calcareous and schistaceous soils, dry slopes, scrub, rocky cliffs, river banks; 300–2000 m. Sichuan, Yunnan.

