CRITICAL COMMENTS ON *CLERODENDRUM FARINOSUM* (ROXB.) WALLICH EX STEUDEL (VERBENACEAE)

Roxburgh (1814) enumerated *Volkameria farinosa* Roxb. (*nomen*) and described it as a new species (1832) based on material from a plant cultivated in the Indian Botanic Garden, Howrah. Clarke (1885) who validated the Wallichian name *Clerodendrum venosum* did so on the assumption that the epithet *farinosa* was preoccupied in *C. farinosum* Wallich, Numer. List No. 1810, which was only a *nomen nudum.*

The Combination *Clerodendrum farinosum* based on *Volkameria farinosa* Roxb., was validly published by Steudel (1840). Walpers (1845) as well as Voigt (1845) made the combination again. Clarke (*l.c.*) seems to have overlooked all these authors following the later monographer Schauer (1847) who treated *C. farinosum* Wallich, a *nomen nudum*, as a synonym of *C. serratum* (L.) Moon but did not take up *C. farinosum* (Roxb.) Wallich ex Steudel. The combination *C. farinosum* (Roxb.) Wallich ex Steudel remained ignored as may be evident from *Index Kewensis* and Moldenke's (1980) compilation till Mabberley (1980) pointed out. However, Mabberley (*l.c.*) did not go into the taxonomy of the species.

Clerodendrum farinosum (= *C. venosum*) has been recorded by very few workers after Clarke (*l.c.*), the last being Panigrahi and Naik (1961). Though there are a few sporadic, old and recent collections of this species from some of the north eastern states in herbaria located in this region, it does not find mention in any of the more recent works. *C. farinosum* appears to have been confused with *C. serratum* (L.) Moon as may be evident from the determination of the specimens made in the herbaria concerned, hence not included in recent works.

Though these 2 species are closely related they can be distinguished from each other as shown below :

1a. Tree, up to 8 m high; leaves petiolate, decussate-opposite, entire or faintly serrate, glabrous; thyrses terminal and axillary, up to 16 cm long, less than 8-cymed; calyx subentire, sparsely pubescent; corolla whitish purple ... *C. farinosum* (Fig. 1)

1b. Shrub, up to 4 m high; leaves sessile or subsessile, usually ternate, markedly serrate, pubescent; thyrses terminal, up to 30 cm long, more than 8-cymed; calyx shallowly toothed, densely pubescent; corolla blue or violet ... *C. serratum* (Fig. 2)

Besides, whereas the distribution of *C. farinosum* in India is restricted to a few states in the north east, *C. serratum*. occurs almost throughout the country (Fig.3). A description is provided for *C. farinosum* with other pertaining details. Notes on the status of the species are provided.

Clerodendrum farinosum (Roxb.) Wallich [Numer. List No. 1810. 1829, *nom. nud.*] ex Steudel, Nomencl. Bot. ed. 2, 1: 382. 1840; Walp., Repert. Bot. Syst. 4: 107. 1845 (as "*Clerodendron*"); Voigt, Hort. Suburb. Calcutt. 466. 1845 (as "*Clerodendron*"); Mabberley in Manilal, Bot. Hist. Hort. Malab. 93. 1980. -Type: as for the basionym. *Volkameria farinosa* Roxb. [Hort. Beng. 46. 1814, *nom. nud.*], Fl. Ind. 3: 64. 1832. Neotype: Arunachal Pradesh, Lower Subansiri F.D., Yazali, 12.11.1980, *G.D. Pal* 65991 (ARUN). (*vide* Daniel & Rajendran, 1993).

Clerodendrum venosum Wallich [Numer. List No. 1807. 1829, *nom. nud.*] ex C.B. Clarke in Hook. f., Fl. Brit. India 4: 592. 1955, *nom. illeg. incl. Volkameria farinosa* Roxb. 1832 (as "*Clerodendron*"); Gamble, Man. Indian Timb. ed. 2,543, 1902 (as "*Clerodendron*"); Brandis, Indian Trees 508. 1906 (as "*Clerodendron*"); Lace, List Trees ect. Burma ed. 2, 133. 1922 (as "*Clerodendron*"); Kanj. *et al.*, Fl. Assam 3 : 490. 1939 (as "*Clerodendron*"); Panigr.& Naik in



Fig. 1: *Clerodendrum farinosum* (Roxb.) Wallich ex Steudel (*J.D. Hooker & T. Thomson s.n.*, K).

Bull. Bot. Surv. India 3:377. 1961; Mold. in Phytologia Mem. 2: 545. 1980.

Tree, up to 8 m high; branches obtusely 4-angular, slightly sulcate between angles, glabrous; bark dark brown, lenticellate; nodes



Fig.2: *Clerodendrum serratum* (L.) Moon (*E. Vajravelu* 27845, MH).

annulate, collapsing at joining with stem; internodes 5-7.5 cm long. Leaves decussate-opposite, elliptic or elliptic-oblong, cuneate at base, short acuminate at apex, 14-24 × 7-22 cm, chartaceous, dark green above, paler beneath, glabrous on both surfaces; lateral nerves 6-8 pairs,

ascending, arcuate at margins, distinct beneath; petioles stout, 3-5 cm long, glabrous. Thyrses terminal and axillary, composed of 5-8 decussate-opposite cymes, up to 16 cm long; peduncles slender, 4-5 cm long, sparsely pubescent or subglabrous; bracts ovate, 2.5-5 cm long, foliaceous; bractlets linear-oblong, 5-8 mm long, persistent. Calyx cupular, *c.* 4 × 4 mm, subentire, sparsely pubescent. Corolla subinfundibular, 5-lobed; lobes oblong-elliptic, *c.* 8 × 4 mm; tube narrow, *c.* 1 × 0.4 cm, glabrous. Stamens, didynamous; filaments exserted; anthers oblong, dark. Drupes obovoid or subglobose, *c.* 1.6 × 1.2 cm, black; fruiting-calyx cupular, *c.* 4 × 12 mm, membranous, glabrous.

Fl. & Fr. : June-December.

Habitat : On hill slopes, 1000-1300 m; rare.

Distribution : India – Arunachal Pradesh, Assam, Meghalaya and Nagaland. Burma, Thailand (Moldenke, 1980), and Bangladesh.

Notes : In the absence of specimens of *C. farinosum* and in the presence of that of *C. serratum* from Mizoram, *C. venosum* sensu Deb & Dutta (1987) appears to be only *C. serratum.*

C. farinosum is not represented by many collections in Indian herbaria and most of them are from present Meghalaya. There is only a couple of recent collections. It has not been recollected in Nagaland after 1907 and in Assam after 1918, after the very first collection. It appears that it is a rare species confined to certain locatlities only. However, the exact status and the causal factors for such a status can be brought to light only by future explorers.

Specimens examined : ARUNACHAL PRADESH: Subansiri F.D., Kimin, 25.9.1959. *G. Panigrahi* 19498 (ASSAM, CAL); Lower Subansiri F.D., Yazali, 12.11.1980, *G.D. Pal* 65991 (ARUN, neotype). ASSAM : Debi Valley, 4000', 23.7.1918. *F. Kingdon-Ward* 8477 (CAL). MEGHALAYA : Mamloo, 24 Octob.? 1835, *Griffith s.n.*, Herb. E.I.C. No. 6052 (K, photo!); Khasia, without date, *Griffith* 1082 (K, photo!); Khasia, Cherra, Aug. 18/(18)50, *J.D. Hooker & T. Thomson s.n.* (K, photo!); Khasia, Cherra, 4300', 7.11.1872, *C.B. Clarke* 18985; *Khasia, Cherra*, 4000', 11.9.1885, *C.B. Clarke* 40377 (CAL); Khasia hills, Wah-mun, 9.11.1922, *U. Kanjilal* 7757; Khasia & Jaintia hills, Mauzmai, 30.6.1930, *P.C. Kanjilal* 8129; Khasia & Jaintia hills, Cherrapunji, 9.8.1931, *P.C. Kanjilal* 9289; Khasia & Jaintia hills, Mauzmai forest, 12.9.1931, *S.R. Sharma* 9558; Khasia & Jaintia hills, Pangtum forest, 30.8.1935, *S.R. Sharma* 12155 (ASSAM); Nongpoh, 8.11.1959, *G. Panigrahi* 19228 (CAL); Balphakram Sanctuary, 6.6.1983, *Y. Kumar* 774 (NEHU). NAGALAND: Sarpung, 5000', Dec. 1907, *A. Meebold* 7258 (CAL).

BANGLADESH : Pundua, *Wallich*, Numer. List No. 1807 (CAL, K, microfiche!).

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P. DANIEL AND A. RAJENDRAN
Botanical Survey of India, Coimbatore