A NOTE ON CHILOCARPUS MALABARICUS BEDD. (APOCYNACEAE)

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The genus Chilocarpus comprising of about 16-18 species is widely distributed in Burma, Malaya and Australia and our concept of the various species is still incomplete due to paucity or lack of fruiting samples. During the years 1961-63, one interesting rare species of Chilocarpus was repeatedly collected from the outskirts of the evergreen forests in Shimoga District (Mysore State), which on examination proved to be C. malabaricus Bedd. On the basis of information obtained from the various Indian herbaria, it is found that ever since Beddome described this species in 1874, based on flowering twigs collected from Malabar and South Kanara in Peninsular India nearly a century ago, this species has not been collected again. After this long lapse, the present collections are the first to be made and more particularly the fruiting specimens, not known even at the time when the species was known to science. From the literature it is obvious that some confusion exists on the correct identity of C. malabaricus Bedd. (1874) in relation to C. atro-viridis Bl. (1850), a native of Malayan Peninsula. Evidently due to meagre herbarium material and lack of fruiting samples, Hooker (1882), Brandis (1906) and Gamble (1923) have all treated this species as identical to C. atro-viridis Bl. and hence included it as a synonym under the latter species. However, King and Gamble (1910) who had a more comprehensive knowledge of the Malayan species of Chilocarpus have indicated on the possible distinctness of C. malabaricus Bedd. which is now confirmed.

An examination of the photograph of the type of C. atro-viridis Bl. (=Hunteria atro-viridis Wall. Cat. No. 1614) and herbarium material particularly of fruiting specimens of both these species together with description of the fruits as given by King & Gamble (1910) and Ridley (1923), clearly establishes the distinctness of C. malabaricus Bedd. The present collections agree well with Beddome's specimens from South Kanara and his Icon. No. 175.


Robust, glabrous, straggler. Leaves elliptic, coriaceous glossy with stout petioles. Inflorescence dense, compact, much shorter than lamina (Figs. 1, 1a). Flowers 9-11 mm long (Fig. 1b), bracteate, creamy. Fruits elliptic obovate, 7-9 mm long, dehiscing at length by two valves (Figs. 2a, 2b), brownish. Seeds many, ellipsoid, brown (Fig. 2d); aril shaggy, prominent, orange-yellow, enveloping about three quarters of the seed (Fig. 2c); cotyledons suborbicular, about 7 mm across; radicles slender, 2.5-3 mm long (Fig. 2e).

For a better understanding of C. malabaricus when compared to C. atro-viridis, the important distinguishing characters of both the species are given below.

Characters of C. malabaricus and C. atro-viridis.
**G. malabaricus**

1. Large robust woody climber ascending up to 4-5 m; flowering twigs 2.5 mm or more in thickness.

2. Lamina on drying, thickly coriaceous, rounded at base or gently attenuated generally 8-15 cm long 3-5 cm broad. (average 12 cm long and 4.8 cm broad); petiole stout, much shorter in young twigs, 6-12 mm long and 1.5 mm or more in thickness.

3. Inflorescence always shorter than leaves, never exceeding half the length of the lamina; secondary and tertiary peduncles shorter than the primary; flowers dense and crowded near apexes of inflorescence; pedicels of flowers of ultimate cymes very much shortened, apparently sessile.

4. Flowers creamy yellow ('white' according to tube of mature flower, Ebel., 1923) generally exceeding more than half the length of lamina; branching peduncles nearly as long as the primary; flowers lax, comparatively 'fewer'; pedicels distinct even in flowers in ultimate cymes.

5. Immature and mature fruits elliptic-oblong but never ovoid (Figs. 2 a, 2 b); mature fruits 7-9 cm long, 1.3-1.6 cm broad.

6. Seeds 12-20 per fruit, brownish, ellipsoid, 5-6 mm long, 3-4 mm broad (Fig. 2 d); aril orange yellow, clothed, each villus spathulate, covering more than half the seed width.

**G. atro-ziridis**

Flower buds in the various stages of development which is substantiated by present detailed field observations. It is apparent that Beddome's reference to the South Kanara specimens having larger flowers with obsolete style and filaments was due to his examination of flower buds in the various stages of development which is substantiated by present detailed field observations.

**Specimens examined:** (1) Chilocarpus malabaricus Bedd.

**MYSORE STATE:** South Kanara District. No precise locality, Beddome s.n. (31363, 31364 MH); Shimoga District. Min-hole in Agumbe, Sundara Raghavan 62499 (BSI); Malanur in Agumbe, Sundara Raghavan 64075 (BSI); Kamburde near Agumbe, Sundara Raghavan 80670 (BSI); Begar village, 9 km from Agumbe on Agumbe-Koppa route, Sundara Raghavan 82399 (BSI); Gubbiga near Yedur, Sundara Raghavan 86213 (BSI).

**Distribution:** Even though the collections are confined to limited areas along the Western Ghats, this species may be regarded for the present as endemic along the slopes of Western Ghats.

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**LITERATURE CITED**

**BEDDOME, R. H.** *Icones Plantarum Indiae Orientalis*; 36, t. 175, 1874.

**BLAIR, C. L.** *Mymusa Bismarckiana Linn.—Botanica 1 : 159, 1556.*


**GAMBLE, J. S.** *Flore of the Presidency of Madras* 5 : 802, 1923.

