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Lectotypification of *Vigna wightii* (Leguminosae: Papilionoideae)

KRISHNARAJ MOOTHEATHU VENUGOPALAN NAIR^{1,*}, NARAYANAN NAIR MOHANAN^{2,3}

¹ Department of Botany, Baselius College, Kottayam, Kerala, India-686001

² Jawaharlal Nehru Tropical Botanic Garden and Research Institute, Pacha-Palode, Thiruvananthapuram, Kerala, India-686562

³ MSSRF, Community Agrobiodiversity Centre, Puthoorvayal, Wayanad, Kerala, India-673577

*Corresponding author. E-mail: krishnarajtbagri@gmail.com

Abstract. George Bentham's *Vigna wightii*, endemic to the Southern Western Ghats, is here lectotypified by using R.H. Beddome's collection from the Anamallai mountains, India.

Keywords: *Leguminosae: Papilionoideae, Vigna*, nomenclature.

INTRODUCTION

The genus *Vigna* Savi (Leguminosae: Papilionoideae) is represented with c.104 species (Delgado-Salinas et al. 2011) and shows complex taxonomy due to its relationship with *Phaseolus* (Marechal et al. 1978; Delgado-Salinas et al. 1993). These authors systematically recognized seven sub-genera in the genus *Vigna* s.l. namely, *Ceratotropis*, *Haydonia*, *Lasiospron*, *Macrorhynchus*, *Plectotropis*, *Sigmoidotropis* and *Vigna*. The sub-genus *Ceratotropis* (Piper) Verdcourt, which is popularly known as Asiatic *Vigna* has its centre of diversity in Asia (Tomooka et al. 2002) with ca. 29 species distributed in India (Dixit et al. 2011; Aitawade et al. 2012; Latha et al. 2014; Gaikwad et al. 2014; Gaikwad et al. 2015; Balan et al. 2017).

During the studies on Leguminosae: Papilionoideae of Kerala State, we found that *Vigna wightii* Benth. ex Bedd., needs to be typified, which is discussed below. The lectotypes are selected based on Art.9.3 and 9.12 of the Shenzhen Code (Turland et al. 2018). Herbarium acronyms follow Thiers (2016).

The name *Vigna wightii* Benth. was first validly published by Beddome in *Trans. Linn. Soc. London* 25(2): 215. 1865 and not in *Icon. Pl. Ind. Orient.* 69. t. 296. 1874 as cited by Noltie (p. 513. 2005). Baker (1876) also overlooked Beddome's treatment of this taxon. However, Baker (1876) curiously referred Beddome's *Icon. Pl. Ind. Orient.* t. 296. 1874 and cited *Carnatic: Courtalum, Wight, Thomson.* (Krishnaraj and Mohanan 2014). While revising the



Figure 1. Herb. Wight Prop. 1836, coll. no. 244 (K000900669!.) Board of Trustees of the Royal Botanic Gardens, Kew).



Figure 2. Herb. Wight, no.798 (K000900668! !@ Board of Trustees of the Royal Botanic Gardens, Kew).



Figure 3. Lectotype of *Vigna wightii* Benth. ex Bedd. (BM001217768! @ British Museum, Natural History).

tribe Phaseoleae in India, Babu et al. (1985) erroneously typified *Vigna wightii* Benth. ex Bedd. based on Wight 1836, deposited at the Kew Herbarium (K), which they again cited as the type of *Phaseolus wightianus* Graham ex Wight & Arn.

While transferring *Phaseolus wightii* Wight & Arn. to *Vigna*, Babu et al. (1985) proposed the name *Vigna hainiana* (as *nom. nov.*) due to the presence of preoccupied epithet 'wightii' under *Vigna* (as *V. wightii* Benth. ex Bedd.). It should also be noted that *P. wightianus* Graham ex Wight & Arn. is a *nom. nud.* and hence it is not a 'name' or validly published name and has not any type. Hence, the replaced synonym of *V. hainiana* should be *Phaseolus wightii* (Wight 1834) or correctly *P. wightianus* Graham ex Wight & Arn. Babu et al. (1985) ascribed the name *Vigna wightii* Benth. to Baker and cited as *Vigna wightii* Benth ex Baker, which is also wrong.

Most probably, the specific epithet 'wightii' was coined by Bentham after examining the materials collected by Wight from Peninsular India. This is clearly evident through the collections of Wight in possession of Bentham, sealed as Herbarium Benthamianum (Herb. Wight Prop. 1836, coll. no. 244(K000900669!). Figure 1.). The ambiguity around this specimen is solved in consultation with Kew herbarium staff and is found that even though collection no. 244 from Wight was received in 1854, before publication of the name *Vigna wightii* Benth. ex Bedd., most probably, the specimen was not studied by Beddome. In the protologue, Beddome described the fruit characteristics as "*legumine tereti, juniore strigoso, adulto glabro*". This means that Beddome studied both young and mature specimens with fruits prior to its publication but none of the collections by Wight in possession of Bentham bears fruits. Another relevant specimen available at Kew Herbarium was collected from Courtallum by Wight during his expeditions in 1836, which is not eligible as type because of its late reception at Kew and bearing a seal as Herbarium Hookerianum. (Herb. Wight, no.798 (K000900668! Figure 2.). This sheet is also devoid of fruits.

Beddome described *Vigna wightii* during his enumeration of Anamallai plants in southern India and did not cite any specimens in the protologue. However a thorough search of Beddome's collections at BM and K culminated in one gathering. At BM, this collection was labelled as Courtallum and Wayanad, *Beddome 2243* [BM001217768!] with the handwriting of Beddome and hence it is eligible as a type. (Figure 3.) This specimen bears flowers and fruits and fully agrees with the protologue including collection locality. Hence we designate this specimen as the lectotype of *Vigna wightii* Benth. ex Bedd.

Nomenclature

Vigna wightii Benth. ex Bedd. Trans. Linn. Soc. London 25(2): 215. 1865

Type: Courtallum and Wayanad, *s.d.*, *Beddome 2243* (BM001217768!), lectotype here designated). Figure 3.

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