

SHORT COMMUNICATION

CROTALARIA PROSTRATA VAR. LEVIS HAINES (LEGUMINOSAE): A POORLY KNOWN SPECIES REDISCOVERED, REDESCRIBED AND ENDEMIC FROM THE NORTHERN WESTERN GHATS, INDIA

NARAYANASAMY DHATCHANAMOORTHY^{1*,} PRAKASAM RAJA², SEBASTIAN SOOSAIRAJ², MUNISAMY ANBARASHAN¹

¹National Herbarium of Medicinal Plants and Repository of Raw Drug, School of Conservation of Natural Resources, Trans Disciplinary University (TDU), Foundation for Revitalisation of Health Traditions (FRLHT), # 74/2, Jarakabande Kaval, Yelahanka, Bangalore 560064, India

²Department of Botany, St. Joseph's College, Tiruchirappalli 620002, Tamil Nadu, India

ABSTRACT

During a medicinal plant survey in Amba MPCA, Raigarh District of Maharashtra, a rare and endemic species of *Crotalaria*, *Crotalaria prostrata* var. *levis*, (Fabaceae) were rediscovered after type specimens author collected from Amba MPCA in Maharashtra after 94 years.

Keywords: Crotalaria prostrata var. levis, Endemic, Rediscovery, Maharashtra, AMBA MPCA.

INTRODUCTION

The genus Crotalaria L. is one of the largest economically important genus belongs to the family Fabaceae. About 702 species were represented and distributed in tropics and subtropics of the world, mostly in Africa and America [1-2-3-4]. In India, it is represented by 93 species, 1 subspecies, 17 varieties and 2 form [5]. There are 44 species and 5 varieties were reported in the state Maharashtra alone [6-7]. Ansari [5] reported 38 endemic and conservatively prioritized species to India, of which 8 are restricted to Maharashtra. They are C. berteroana var. yasminii (M. R. Almeida and S. M. Almeida) A. A. Ansari, C. filipes var. trichophora (Baker) T. Cooke, C. filipes var. panthaki M. R. Almeida and S. M. Almediea, C. Benth., C. ramosissima Roxb., С. leptostachya leschenaultia DC., C. lutescens Dalzell and C. pulchra Andr.

During the process of identification and authentication of the specimens with the help of published resources [8-5], the authors confirmed the species as *Crotalaria prostrata* var. *levis* Haines of Fabaceae. Only a small population with 8 individuals were observed within the MPCA.

This endemic species was collected by [8], from Neterhat of Jharkhand state and it is poorly represented in the Indian Herbaria. During the present field study in the Amba Medicinal Plants Conservation Area (MPCA-fig. 1) (Moist deciduous forests and Semi-evergreen), Raigarh district of Maharashtra, the authors recorded this plant species 94 year after the previous reported collections. The specimen was critically examined with the reference of available relevant literature [8-5-Kew Herbarium], voucher specimens were deposited in the herbarium (FRLH), the newly collected plants have been identified as *Crotalaria prostrata* var. levis. (Fig.1). In India only one type specimen represented and after type specimens, author collected endemic species from Amba MPCA in Maharashtra state. This study is aimed to document the distribution, habitat, plant description, Phenology along with illustration and notes has been provided for easy identification and further reference to this species.

The first collection of this endemic species was made during 1922 from Neterhat of Jharkhand at 3000 feet elevation, on open places by H. H. Haines and which was deposited at KEW (4370 K-Cibachrome). As per Ansari [5], the present collection was rediscovered after 94 years and new record from Maharashtra, India. In addition, the species distribution was extended from the eastern side to the western side of India. The Indian floras such as [9-10-6-5] have not collected and mention about this species. Until recently, the species has not been collected after the initial Haines collection. Despite the revisions of Indian *Crotalaria* L. was done by Anasari [5] and floristic studies carried out by various researchers [11-6-7] in the Western Ghats.

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*Corresponding Author

Narayanasamy Dhatchanamoorthy

National Herbarium of Medicinal Plants and Repository of Raw Drug, School of Conservation of Natural Resources, Trans Disciplinary University (TDU), Foundation for Revitalisation of Health Traditions (FRLHT), # 74/2, Jarakabande Kaval, Yelahanka, Bangalore 560064, India

Email: dhatcha@gmail.com

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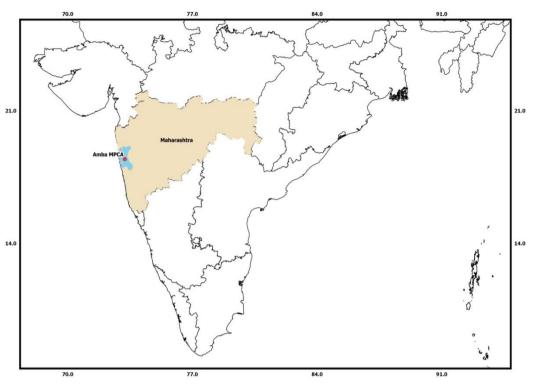


Fig. 1: Location and collection of Crotalaria prostrata var. levis Haines in Peninsular India

Taxonomic description

Crotalaria prostrata var. *levis* Haines, Bot. Bih. Or. 2:230. 1922. 1922 (repr. ed. 2: 240. 1961); Mooney, Suppl. Bot. Bih. Or. 45. 1950; Sanjappa, Leg. India 127. 1991; Ansari, Crotalaria India 202. 2008. (Leguminosae).

Prostrate herb; branches filiform, linear, strigosely hairy. Leaves simple, linear, oblong, 12-20 x 3-5 mm, attenuate at base, entire, recurved at margins, obtuse at apex, appressedpubescent on both surface, pale brownish; lateral nerves obscure; petiole minute or sessile. Stipules absent. Lax racemes, leaf-opposed, terminal; peduncle 2-12 cm long, filiform, slender, sparsely hairy; pedicle filiform, c. 3 mm long. Flowers 2-5, c. 7 x 6 cm across; bracts and bracteoles almost similar, filiform-linear, c. 2 mm long, ciliate. Calyx 5-lobed; lobe linear-lanceolate, c. 4 mm long, acuminate at apex, densely strigosely hairy, pale brownish. Corolla yellow; standard petals ovate-obovate, c. 4 mm long, strigosely hairy on upper side; wing petals oblong, c. 3 mm long; keels petals oblong, c. 3 mm long. Pods subsessile or pedicel c. 4 mm long, c. 10 mm long, glabrous seeds c. 8, reniform, minute, pale yellow-brownish.

Flowering and Fruiting: December-January

Habit: Semi evergreen forest

Distribution: INDIA: Jharkhand, Orissa and now from Maharashtra state

Specimens examined: INDIA: Amba MPCA, Raigarh District, Maharashtra, 17.03.2017,

P. Raja and N. Dhatchanamoorthy (SJCBOT-2540).

CONCLUSION

This plant species is recollection and addition to Maharashtra from Amba Medicinal Plants Conservation

Area (MPCA) of Raigarh district of Maharashtra. This species was earlier reported from Jharkhand and not reported elsewhere form India and also from Indian herbaria. Since it's rare, restricted distribution and found only few individuals from semi-evergreen forests of Amba MPCA. Since, this location is very important for the conservation of this endemic and threatened species.

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