



## Research Article

### “ANUKTA DRAVYAS FROM CAMPUS OF AYURVED MAHAVIDYALAYA, SION & NEIGHBOURING AREAS OF MUMBAI ,MAHARASHTRA”

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## ABSTRACT

Field survey was conducted in campus of Ayurved Mahavidyalaya, Sion; Kharghar, Navi Mumbai & Kalina University of Mumbai region, Maharashtra. Eight anukta dravyas namely, *Muntingia calabura*, *Pimento diocia*, *Dregia volubilis*, *Millingtonia hortensis*, *Mussenda phillipica*, *Mansoa alliceae*, *Albezia saman* and *Ipomea obscura* were identified with the help of taxonomists & botanists. Comprehensive literature review was done. This paper provides information about botanical name of species, family name, vernacular name, plant part used & ethnomedicinal uses of these plant species. Based on review of literature & field data available so far, it can be stated that these eight dravyas need further evaluation as per Dravyaguna Siddhants & thereafter can be enthusiastically adopted by API as its recent inclusions.

Keywords : *Anuktadravyas*, *ethnomedicinal*, *field survey*, *Sion*, *Mumbai*.

## INTRODUCTION

### INTRODUCTION

The knowledge about medicinally useful plants is scientifically documented & systematically organized in Ayurved Samhitas, Nighantus & other texts. But there are still many plant species which are yet to find their rightful place in our rich literature. Such plants are referred as Anukta Dravyas. Arbitrarily the phrase can be defined as “any substance which is medicinally useful but did not find a direct or indirect mention in Ayurveda texts at a certain period of time in a chronological manner (i.e., it may be absent in the older texts, but may find a place in the later texts). It also may be an altogether a new drug to Ayurveda which deserves a place in Ayurvedic pharmacopoeia by virtue of its effectiveness, availability and current usage by Vaidya community.

### NEED FOR STUDY

Due to rapid deforestation & global urbanization , leads to destruction of the rich floral heritage. Many

plant species have become endangered & paving their way towards extinction. Lack of standard taxonomy, practice of concealing knowledge about herbal remedies & lack of documentation are some of the concerns faced by Ayurved faculty. Thus, there is an urgent need to first demarcate, identify, name these plants, described botanically & then analyze them scientifically as per Dravyaguna Siddhantas so that they can be successfully utilized in therapeutics & documented by incorporating into Ayurvedic material Media for future reference.

### AIMS & OBJECTIVES

1. Identification of Anukta Dravyas in Mumbai region
2. Ethnomedical review of these dravyas.

### MATERIALS & METHODS

**Study Area** : Mumbai lies at the mouth of the Ulhas River on the western coast of India, in the coastal region known as the Konkan. It sits on Salsette Island (Sashti Island), which it partially



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shares with the Thane district. Mumbai is bounded by the Arabian Sea to the west. Navi Mumbai is a planned township of Mumbai off the west coast in Konkan division. Many parts of the city lie just above sea level, with elevations ranging from 10 m (33 ft) to 15 m (49 ft) the city has an average elevation of 14 m (46 ft). Soil cover in the city region is predominantly sandy due to its proximity to the sea. Mumbai has a tropical climate, specifically a tropical wet and dry climate (i.e Sadharana desha)

**Materials** : 8 Anukta Dravyas have been taken up as the material for present study.

**Methodology**: Field survey was conducted in campus of Ayurved Mahavidyalaya Sion, Kharghar, Navi Mumbai & Kalina University of Mumbai region, Maharashtra. The selected plant specimens were photographed which exhibits details of plant. Identification was done with the help of plant taxonomists & botanists. Information related to 8 anukta dravyas was gathered through comprehensive survey of literature (books, journals, published & unpublished works.

## OBSERVATIONS & RESULTS

The knowledge on 10 plant specimens during field studies and through comprehensive survey of

relevant publication was further studied for their correct botanical identification. Common names of plants corresponding to their botanical names, Family, native, morphology are presented in Table 1. Information related to 8 Anukta Dravyas, useful part and therapeutic uses of identified 8 anukta dravyas by literary survey have been presented in Table 2.

## CONCLUSION

The information obtained from this ethnobotanical study is to ensure the therapeutic efficiency of the traditional medicinal plants, which may be used as leads in developing novel therapeutic agents. Since the users are based on empirical knowledge, scientific studies of all these herbal drugs are highly desirable to establish their efficiency for safe use. A recent review of literature revealed that the below medicinal plants have been only sparingly investigated for their ethnomedicinal uses and hence the collected information may be useful for researchers in the field of ethnobotany, taxonomy, pharmacology and Vaidya community. The inclusion of ethno medically important plants, in to Ayurveda pharmacopoeia, is possible only after their proper identification and repeated observations of their pharmacological properties and actions.

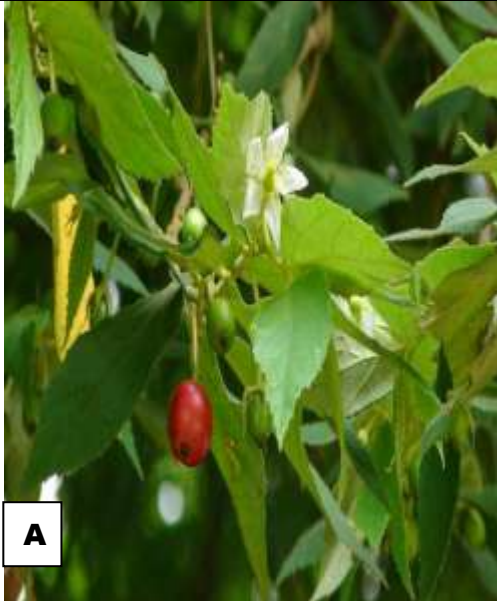
**TABLE 1 : List of common names, native, family, habit & location of these anukta dravyas corresponding to their botanical names**

SR NO	LATIN NAME	COMMON NAME	Native	FAMILY	HABIT	LOCATION
1.	<i>Muntingia calabura</i> L.	Indian Cherry, Jam Tree, Cotton Candy Berry, Jamaica Cherry	Mexico South To Bolivia.	Eleocarpaceae	Tree	Sion, Mumbai
2.	<i>Pimenta diocia</i> (L) Merr	Allspice, Jamaica Pepper	Southern <u>Mexico</u> , And <u>Central America</u> .	Myrtaceae	Evergreen Shrub	Sion, Mumbai
3.	<i>Mussenda philippica</i> A.Rich	Bangkok Rose, Queen Sirikit	West Africa	Rubiaceae	Shrub	Sion, Mumbai
4.	<i>Dregia volubilis</i> (L. f.) Benth. ex Hook. f. 1883	Greenwax Flower, Hemajivanti	India	Apocynaceae	Climber	Sion, Mumbai
5.	<i>Millingtonia hortensis</i> L.f.	Indian Cork Tree, Akasknimba	South Eas & South Asia	Bignoniaceae	Tree	Sion, Mumbai
6.	<i>Albezzia saman</i> F.Muell	Rain Tree, 5'o Clock Tree, Monkey pod	<u>Mexico</u> South To <u>Peru</u> And <u>Brazil</u>	Fabaceae	Tree	Sion, Mumbai
7.	<i>Mansoa alliaca</i> Gentry	LahasunVel, Garlic Vine	Southern & Central America, Brazil	Bignoniaceae	Creeper	Kalina, Mumbai
8.	<i>Ipomoea obscura</i> (Linn.) Ker.-	Obscure Morning Glory, Small White Morning Glory	Africa, Asia, Pacific Islands	Convolvulaceae	Creeper	Kharghar, Navi Mumbai



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A. *Muntingia calabura*, B. *Pimemta diocia*, C. *Dregia volubilis*, D. *Mussenda phillipica*, E. *Millingtonia hortensis*, F. *Mansoa alliaceae*, G. *Albezia saman*, H. *Ipomoea obscura*.

**TABLE 2: *Ethnomedicinal Uses along with useful parts of these 8 Anukta Dravyas***

SRNO	LATIN NAME	PLANT PART USED	ETHNOMEDICINAL USES
1.	<i>Muntingia calabura L.</i>	Roots	Used as an emmenagogue in Vietnam and as an abortifacient in Malaysia. <sup>[1]</sup>
		Bark	The boiled barks can be used as a wash to reduce swelling in the lower extremities <sup>[1]-[2]</sup>
		Flowers	In Philippines, the flowers is also used to treat headache and incipient cold or as tranquillizers, antispasmodics and antidyspeptics <sup>[1]</sup>
		Leaves	The leaves, either boiled or steeped in water, are used to reduce gastric ulcer and swelling of prostate gland, and to alleviate headache and cold. <sup>[1]</sup>
2.	<i>Pimenta diocia (L) Merr</i>	Leaves	The leaves toasted, powdered and boiled with ghi (butter oil) are considered as a valuable application in aphthous affection A paste of leaves is applied on ulcers, hemorrhoids and swellings. <sup>[6]</sup>
		Seeds & Fruits	Used as cleansing agents to improve difficult breathing, relive pain and to improve vision



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			<p>Jamaicans also drink hot tea with Allspice for colds, dysmenorrhea (menstrual cramps) and dyspepsia (upset stomach).</p> <p>Guatemalans are known to apply crushed Allspice berries to bruises, sore joints and for myalgia (muscle ache).<sup>[7]</sup></p>
3.	<i>Mussenda phillipica</i> <i>A.Rich</i>	Root	Root Premature ejaculation. 1 tola (local measure, 1 tola = philippica A. Rich 11.4 g) root is crushed with 1 and ¼th black pepper seed and taken in Bangladesh. <sup>[11]</sup>
		Bark	For stomach ache. <sup>[10]</sup>
		Leaves & sepals	Used for affections of chest and lung while the white, full-grown sepals are used in jaundice. <sup>[10]-[11]</sup>
4.	<i>Dregia volubilis</i> (L. f.) Benth. ex Hook. f. 1883	Leaves	4-5 leaves with 5-10 leaves of Nelagulimidi (Enicostema axillare) were made into juice added with pinch of pepper powder, administered immediately bandaged over the snake bite and the juice is given orally. <sup>[6]</sup> Leaf paste is applied as an antiseptic in cuts & wounds. <sup>[4]</sup>
		Root	Used in Paralysis, Rheumatism, Tonsils, Neck pain in Andhra Pradesh. <sup>[3]</sup> Root juice + warm water is used as expectorant & emetic. <sup>[4]</sup>
5.	<i>Millingtonia hortensis</i> <i>L.f.</i>	Leaves	Dried leaves are consumed to cure chest pain. <sup>[13]</sup>
		Flowers	Flowers paste is taken with lukewarm water twice a day for 4 days to cure jaundice. Smoking dried flowers for treating asthma. Also used as cholagogue & as a tonic. <sup>[13]</sup>
		Root	Used as anti tuberculous & anti -asthmatic agent. <sup>[13]</sup>
6.	<i>Albezzia saman</i> F. Muell.	Bark	A decoction of the inner bark and fresh leaves is treatment for diarrhoea, while a brew of small sections of the bark is taken to treat stomach-ache.. <sup>[14-16]</sup>
		Leaves	Its infusion is used as laxative. <sup>[14-16]</sup>
		Seeds	Seeds are chewed for sore throat.. <sup>[14-16]</sup>
		Fruits	Chew fruits for dysentery & haemorrhage Decoction for anxiety & nervousness.. <sup>[14-16]</sup>
		Root	Root decoction in baths for stomach cancer in Venezuela. <sup>[14-16]</sup>
7.	<i>Mansoa alliaca</i> <i>Gentry</i>	Leaves	Use of dried leaves in Peru includes the treatment of colds, pneumonia and malaria, as an insecticidal and anti-rheumatic. The infusion of the leaves could be used as an analgesic, in the treatment of arthritis (infusion of the leaves or application of the crushed leaves on the affected area)



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			For headache (crushed leaves used as a patch on the forehead). <sup>[17]</sup>
		Stem	In the Guianas the decoction of the stems and leaves has been used as an external wash against pains and muscular fatigue. In Surinam, a piece of stem is kept in a glass of water and the water is drunk in the last month of pregnancy for a healthy confinement). <sup>[17]</sup>
		Bark	In the treatment of epilepsy (tea made of the bark)). <sup>[17]</sup>
8.	<b><i>Ipomoea obscura</i>(Linn.) Ker.-Gowl</b>	Leaves	Leaf paste with castor oil is applied on wounds. Leaves used in atheros affections after roasting and boiling in ghee. Applied on sores also. Half teaspoon of leaf extract administered thrice in two hours in Acute stomachache . 100gm of leaf paste boiled in 300gm of gingelly oil ( <i>Sesamum indicum</i> ), decoction administered daily once for fortnight in Horn cancer. <sup>[18]</sup>
		Seeds & Fruits	Seeds and fruits are used as cleansing agents to improve difficult breathing, relieve pain and to improve vision. <sup>[19]</sup>

## REFERENCES:

1. *Muntingia calabura*: A review of its traditional uses, chemical properties, and pharmacological observations Article in *Pharmaceutical Biology* · July 2014 Volume 52, 2014 - Issue 1 Pages 1598-1623
2. Useful Tropical Plants Database
3. Ethno-botanico-medicine for common human ailments in Nalgonda and Warangal districts of Telangana, Andhra Pradesh, *Annals of Plant Sciences* ISSN: 2287-688X , \*Prof. Dr. Vatsavaya S. Raju., Page 220 -228.
4. Ruapanjali Sharma, Ethnomedicines of Sonapur, Kmrup district, Assam, *Indian journal of traditional Knowledge*, vol 9(1) jan 2010, 163-165
5. Ethnobotanical Leaflets 12: 391-400. 2008. Ethnomedicinal and Ethnoveterinary Plants from Boath, Adilabad district, Andhra Pradesh, India M. VenkatRamana, 16 June 2008.
6. *Indian journal of traditional Knowledge* - vol 14 (2) , april 2015, 313-318
7. Medicinal Properties of the Jamaican Pepper Plant *Pimentadiaoica* and Allspice, Lei Zhang Pubmed Canada ,*Curr Drug Targets*. 2012 Dec; 13(14): 1900–1906.
8. Preliminary Phytochemical screening of *Ipomoea obscura* (L) -A hepatoprotective medicinal plant Arvind J. Mungole, *International Journal of PharmTech Research* CODEN (USA): IJPRIF ISSN : 0974-4304 Vol.2, No.4, pp 2307-2312, Oct-Dec 2010
9. Ethnomedicinal uses of some plant studies Mancheril and Jannaram reserve forest division of Adilabad district, Telangana State, India, *Journal of Scientific and Innovative Research* 2014; 3(3): 342-351.
10. Medicinal Plants Used By Malasar Tribes Of Coimbatore, Tamil Nadu, *Indian journal of traditional Knowledge*, vol 6 (4) , OCT 2007, 579-582
11. Screening of the Antioxidant Properties of the Leaf Extracts of Philippine Medicinal Plants *Ficus nota* (Blanco) Merr., *MetroxylonsaguRottb.*, *Mussaenda philippica* A. Rich., *Inocarpusfagifer*, and *Cinnamomum mercadoi* Vidal Felmer S. Latayada1. *Bulletin of Environment, Pharmacology and Life Sciences Bull. Env.Pharmacol. Life Sci.*, Vol 5 [3] February 2016: 18-24
12. Comparative Analysis of Medicinal Plants Used by Folk Medicinal Healers in Villages Adjoining the Ghaghot, Bangali and Padma Rivers of Bangladesh,



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- American-Eurasian Journal of Sustainable Agriculture, 4(1): 70-85, 2010 ISSN 1995-0748 © 2010
13. Ethnomedical study of Khamti tribe of Arunachal Pradesh, A K das Indian journal of traditional knowledge , vol 5,30, july 2006, 317-322
  14. Agroforestry Database 4.0 (Orwa et al.2009) Page 1 of 5
  15. Plant Gum Exudates of the World: Sources, Distribution, Properties, and Applications,By Amos Nussinovitch, CRC press 2010 by Taylor & francis group LLC, pg 113.
  16. Duke's Handbook of Medicinal Plants of Latin America, By James A. Duke pg 605 CRC press 2009 by Taylor & francis group LLC, pg 605
  17. Phytochemical studies on Mansoa alliacea (Lam.) 24–05 – 2013, International Journal of Advances in Pharmaceutical Research, ISSN: 2230 – 7583
  18. Medicinal plants used by Malasar tribes of Coimbatore district, Tamil Nadu, Oct 2007, CSIR,pg 579-582.
  19. Ethnobotanical Documentation of a Few Medicinal Plants in the Agasthiyamalai Region of Tirunelveli District, India Shubashini K., Ethnobotanical Leaflets 14:173-81, 2010.

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