



Herbal Garden (Muligai Vanam)

Ummathai



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Botanical Name	:	<i>Datura metel</i> Linn.
Tamil Name	:	Ummattangani/Vella-Ummathai
Sanskrit Name	:	Dhustura
English Name	:	Downy thorn apple/Metal thorn apple

Distribution and Habitat

Datura metel Linn. is a member of the Solanaceae family. *Datura* prefers a warm temperature and is distributed in the warmer regions of the world. Common as a weed growing in open lands and roadside throughout India, sub-Himalayan tracts including the north west Himalaya, Kashmir, Bihar, Orissa, West Bengal, Madhya Pradesh, open forests of Rajasthan, mountains of the Deccan, Karnataka and Tamil Nadu. The plant is an annual branching shrub that can grow up to 2 m high. The whole plant is distinctly purple and is pubescent. The leaves are large, alternate, broadly ovate with rounded base and measure 15-30 cm long. The leaf blade is thin with margins entire and both surfaces pubescent. The flowers are large and borne singly in the leaf axils. They are funnel shaped and consist of five petals which measures 15-25 cm long are fused at the entirety except at the top where it is spreading. The fruit is rounded,



measuring 2-5 cm in diameter, and covered with long prickles. The fruit dry and turn brown at maturity. They are dehiscent releasing small kidney shaped dark brown seeds.
<https://www.indiamart.com/proddetail/datura-metel-dry-matter-20018678273.html>

Parts used medicinally

Whole plant.

Medicinal uses

Datura, a widely growing plant from the Solanaceae family, is attributed with both poisonous and medicinal values. In tropical Asia and Africa the most widely documented use of *D. metel* is for relieving asthma, cough, tuberculosis and bronchitis by smoking the dried leaves, roots or flowers as a cigarette or in a pipe. These 'asthma cigarettes' have been shown to be very effective. Cigarettes made with the leaves are also used to treat Parkinson's disease. However, as the alkaloids are responsible for both the medicinal and hallucinogenic properties are toxic in higher amounts, and careless use often results in hospitalization and deaths. The dried leaves, flowers and roots are used as narcotic, antispasmodic, antitussive, bronchodilator, anti-asthmatic and as hallucinogenic. The plant is also used in diarrhoea, skin diseases, epilepsy, hysteria, rheumatic pains, haemorrhoids, painful menstruation, skin ulcers, wounds and burns (Jamdhade et al., 2010). In Ayurveda, the plant is considered bitter, acrid, astringent, germicide, anodyne, antiseptic, antiphlogistic, narcotic and sedative. Seeds are used externally for piles. Seeds, leaves and roots are used in insanity and cerebral complications.

Asthma Cigarettes 1800-1985:

- ☀ A long time passed before British physician and asthmatic James Anderson visited India and enjoyed breathing relief after smoking a cigarette containing *datura stramonium*.
The year was 1802.
- ☀ Dr. Sims a friend of Anderson in Edinbergh, noted the benefits, and published a report in the *Edinbrugh Medical and Surgical Journal*.
- ☀ After this report ,asthma cigarettes were entered into British and American pharmacopoeia, and became popular for the treatment of asthma in these western nations.

Sneader, Walter, "Drug discovery: a history, 2005, England, page 96\



Conclusion

D. metel is a medicinal plant used as phyto-medicine to treat traditionally a wide range of health complications. *Datura metel* is well known for its insecticidal, herbicidal, anti-fungal, anti-bacterial, anti-cancer, anti-inflammatory and anti-rheumatoid activity. This plant can be explored further as per its diversity of traditional uses and on the basis of a wide range of chemical compounds reported to be present in various parts of the plant.

