

WORLD JOURNAL OF PHARMACEUTICAL RESEARCH

SJIF Impact Factor 8.453

Volume 13, Issue 13, 1483-1494.

Review Article

ISSN 2277-7105

A CRITICAL EVALUATION OF VRISHADI LEPA- A HERBAL FORMULATION

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Article Received on 19 May 2024,

Revised on 09 June 2024, Accepted on 30 June 2024

DOI: 10.20959/wjpr202413-33105



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ABSTRACT

Skin is a shield which protects us from various external invasions. Skin is the organ of the body which is readily available for inspection by the eyes. Of all the organs, skin is larger one and is exposed to disease and injury. In Ayurveda, the word 'Twacha' or 'Charma' is used for skin. Twacha is derived from the Dhatu- Twach Samvarne meaning covering of the body. All the skin diseases in Ayurveda have been discussed under the broad headings of Kushta. *Dadru* is a skin disease, spreading in nature, challenging to cure completely and it needs more promising intervention giving rapid effect. Acharyas have said management of different treatment principles for Kustha. Vishaprayoga the concept mentioned in Ayurveda wherein the is Visha Dravyas are used for therapeutic purpose and it acts as wide by judicious use. In Vrishadi Lepa has seven ingredients, among these

ingredients one of the drugs is *Karaveera*. *Vrishadi Lepa* is apparently effective in *Kustha Vyadhi* and has anti-fungal, anti-microbial, analgesic activity. Acharyas such as *Charaka* & *Harita* have explained it in their classical texts. Along with *Dadru Kustha*, it can be used for the treatment of all type of *Kustha* and *Krimi*.

KEYWORDS: Dadru Kustha, Dermatophytosis/Tinea, Vrishadi lepa.

INTRODUCTION

There are two types of Kushta^[1] described in Ayurvedic classics, Mahakushta and *Kshudra Kushta*. *Mahakushta* is subdivided into seven and *Kshudra Kushta* into eleven types.

Mahakushta^[2] - Kapala, Udumbara, Mandala, Rushyajihwa, Pundarika, Sidhma and Kakanaka.

Kshudra Kushta^[3] – Eka Kustha, Charmakhya, Kitibha, Vipadika, Alasaka, Dadru, Charmadala, Paama, Sphota, Shataru and Vicharchika.

Dadru Kushta is prioritized in the Ayurvedic literatures as both Mahakushta and Kshudra Kushta. Acharya Charaka includes it under Kshudra Kushta^[4], whereas it has been elaborated under Mahakushta^[5] by Acharya Sushruta and Vagbhata. Dadru is Kapha-Pitta Pradhana Vyadhi^[6], surfacing skin with the lakshanas like Kandu, Raaga, Deerghapratana, Utsanna, and Mandalavat udgata Pidaka.^[7] Acharya Sushruta mentions Kushta as Sankranmika Vyadhi which hold good for Dadru. According to Dalhana Dadru Kustha is of two types Viz. Sita and Asita.^[8] Asita Dadru is included under Mahakushta by Sushruta because it is cured by Mahā Upakrama (broad and multi spectrum treatment) and Anubandhi prakarsat (having the tendency of persistence), whereas the Sita Dadru Kustha due to its Sukha Sādhya nature, absence of entry into successive Dhātus and not having lot of severe symptoms.^[9]

Modern View

Manifestation of *Dadru Kustha* appears similar to that of Dermatomycosis.^[10] More than 10 million dermatomycosis affected patients are reported in India per year. In modern science there are three genera of superficial dermatophytosis as Trichophyton Microsporum and Epidermophyton. They are grouped according to their natural habitat as geophilic (soil), zoophilic (animals), and anthrophilic (humans).^[11] Transmission may be indirect or direct bodily contact. Clinically, these fungal infections are labelled according to the region involved. These are as follows:^[12]

- **1. Tinea capitis** occurring on the scalp, especially in children.
- **2. Tinea barbae** affecting the region of beard in adult males.
- **3. Tinea corporis** involving the body surface at all ages.
- **4. Tinea cruris** occurs most frequently in the region of groin in obese men, especially in hot weather.

- **5. Tinea pedis or 'athlete foot'** is located in the web places between the toes.
- **6. Onchyomycosis** shows disintegration of the nail substance.
- **7. Tinea vesicolor** caused by Malassezia furfur generally affects the upper trunk.

Predisposing factors

Warm, humid climate, poor nutrition n and hygiene, obesity, diabetes mellitus and debilating illness.^[13]

Symptoms of Dermatophytosis

Common symptom is pruritus in all types of dermatophytosis. Other clinical features are intense itching, annular erythematous scaly lesions, the active border consists of papulovesicular lesions, and in advancing stage the lesions spread peripherally with central clearing and pigmentation.^[14]

Clinical features of *Dadru Kushta* and Dermatophytosis (Mycoses / Tinea / Ringworm) are similar with each other so the co-relation between *Dadru Kushta* and Dermatophytosis is done on the basis of similarities of clinical features in both Ayurveda and Modern medicine.

Prevalence rate of Dermatophytosis (Tinea)

The prevalence rate of this infection is 2% among young adults and increases to 20% among individuals of 40-60 years age.^[14] 39% of the world population is suffering from Tinea infections. In India also, 5 out of 1000 people are suffering from Tinea infections.^[15]

Twak Shareera

Acharya Sushruta described the formation of *Twak* in the developing foetus. He says that after fertilization of ovum *Twak* develops just like cream on the surface of the boiled milk. [16] *Acharya Vagbhata* also followed the same. [17] *Twak* is one among the *Matrija Bhava*. According to *Vagbhata*, *Twak* formation in the foetus will be completed in the sixth month. *Vagbhata* described the formation of *Twak* due to *Paka* of *Rakta Dhatu* by its *Dhatwagni* in the foetus. After *Paka*, it dries up to form *Twak*.

Table No 1: Layers of Twak According to Acharya Sushruta Sarira Sthana.

SL.No	Layers of Twak	Pramana	Disease
			Varna-Chaya Prasadaka,
1.	Avabhasini	1/18 th Vrihi	Adhishtana of Sidhma and
			Padmakantaka
2	Lohita	1/16 th Vrihi	Adhishtana of Tilakalaka,

			Vyanga and Nyaccha
2	Shweta	1/12 th Vrihi	Adhishtana of Charmadala,
3		1/12 Vrint	Ajagallika and <i>Mashaka</i>
4	Tamra	1/8 th Vrihi	Adhishtana of Kilasa Kushtadi
5	Vedini	1/5 th Vrihi	Adhishtana of Kushta, Visarpa
6	Rohini	Vrihi (Rice Grain)	Adhishtana of Granthi, Apachi,
U		Vrini (Rice Grain)	Arbuda, Sleepada and Galaganda
7	Mamsadhara	Vrihi Dwaya	Adhishtana of Bhagandara, Vidradhi
			and Arsha

Nidana for Dadru Kushta

There is no separate Nidana for *Dadru Kushta*. *Dadru Kushta* spreads from person to person by *Malaja Krimi* through *Sweda* (contact with the infected person and contact with the wearables of the infected person etc.) ^[18] Due to the sharing of towels, bed sheets, soap, hand kerchief etc. of infected person causes the spreading of micro - organism from one person to another person. ^[19]

Dadru Kushta is likely similar to fungal infection of the skin in which the fungal spores has been transferred from a diseased person to a healthy person by above explained modes.

Samprapti of Dadru Kushta

Sharing the wearables of infected person (contagious/*Sankramika*)

Sankramika of Krimi from Purusha to Purusha (Malaja - Bahya Krimi)

Krimi enters into Twak through Sweda and vitiates Tridosha, Twak, Rakta and Lasika

Dadru Kushta (Kandu, Pidika, Raaga, Mandala, Visarpini)

Table 2: Sign & symptoms of *Dadru Kushta* according to various *Acharyas* and Modern Science.

Sl No	Signs & Symptoms	Charaka	Sushruta	Ashtanga Hridaya	Ashtanga Samgraha	Madhava Nidana	Yogaratnakar	Modern
1	Kandu (itching/ pruritus)	✓		✓	✓	✓	✓	✓
2	Raga (redness/ erythema)	✓		✓	✓	✓	✓	✓
3	Atasi Pushpavat Pidika (macular rashes similar to flax flower)		✓	✓				

4	Tamra Varna Pidika (copper coloured macular rashes)	ł	✓				ł	
5	Visarpani Pidika (diffused macular rashes)	1	√	✓	✓		1	
6	Dirgha Pratana (tendril like macular rashes	1		✓	✓		1	
7	Unnata Mandala (raised border ring)			√	√	√		
8	Scaling							✓
9	Vesiculation s							✓

Table 3: Ingredients of *Vrishadi Lepa* with Properties and Indication as per *Haritha Samhita*. [20]

Sl No.	Dravya (Drug)	Rasa (Taste)	Guna (Property)	Virya (Potency)	Vipaka (Metabolic property)	Doshaghnata
1.	Vasa (Adhatoda vasica Nees)	Tikta, Kashaya	Ruksha, Laghu	Shita	Katu	Kapha pitta samaka
2.	Kutaja (Holarrhena antidysenterica Wall.)	Tikta, Kashaya	Ruksha, Laghu	Shita	Katu	Kapha pitta samaka
3.	Saptaparna (Alstonia scholaris)	Tikta, Kashaya	Laghu, Snigdha, Sara	Ushna	Katu	Kapha pitta samaka
4.	Karaveera (Cerebra thevetia)	Katu, Tikta	Laghu, Ruksha, Tikshna	Ushna	Katu	Kapha pitta samaka, Vata samaka
5.	Karanja (Pongomia pinnata)	Katu, Tikta, Kashaya	Laghu, Tikshna	Ushna	Katu	Vata Kapha samaka
6.	Nimba (Azadirachta indica)	Tikta, Kashaya	Ruksha, Laghu	Shita	Katu	Kapha pitta samaka
7.	Khadira (Acacia catechu)	Tikta, Kashaya	Ruksha, Laghu	Shita	Katu	Kapha pitta samaka

Table 4: Ingredients of *Vrishadi Lepa* with Action & Therapeutic Indications as per *Haritha Samhita*. [21]

Sl No.	Dravya (Drugs)	Karma (Action)	Therapeutic Indication
1	Vasa	Swasahara, Kasahara, Hridya, Rakta Pittahara, Mehahara, Kusthaghna, Varnya	Kustha Raktapitta Aruchi
2	Kutaja	Kusthaghna, Krimighna, Amapachaka, Dipana	Kustha Krimi Twak Vikara
3	Saptaparna	Kusthaghna, Krimighna, Dipana, Hridya, Raktadosajit	Kustha Krimi Agnimandya Raktavikara Hrid roga
4	Karaveera	Kusthaghna, Kandughna, Krimighna, Vishakara, Vranahara, Twakrogahara.	Kustha Kandu Krimi Jwara Vrana Vishphota Twak roga.
5	Nimba	Krimighna, Vishaghna, Kusthaghna, Ruchikara, Vranaghna,	Kustha Twak roga Surameha
6	Karanja	Kandughna, Kusthaghna, Jantughna, Shothahara, Vedanasthapana, Dipana, Pachana,	Kustha Kandu Jantu Vikara Ajirna Prameha
7	Khadira	Kusthaghna, Kandughna, Kasaghna, Krimighna, Switrahara, Rucya	Kustha Kandu Krimi Aruchi, Ajeerna

Method of Preparation: As per *Acharya Charaka*, it is administered in the form of *Lepa*, *Pana* & used for *Snana*. [22] As a specific preparation method is not mentioned, a general preparation method can be adopted.

All the above said 7 herbal ingredients are made into coarse powder by pounding in Khalva yantra separately and sieved. Then the fine powders of the ingredient are mixed well to form a homogenous mixture. Then the powder is mixed with luke warm water and applied as *lepa* and *snana churna*.

Mode of Administration: It can be taken as *pana* (Internal medicaments) as well as *snana* (Bath) & *lepa* (Ointment). [23]

Indication: Kustha (Obstinate skin disease) & Krimi (Parasitic infestation). [24]

Probable Mode of Action: The pharmacological properties of the particular ingredients of *Vrishadi lepa* are discussed here to get a clear idea about the mode of action in the management of *Dadru Kustha*.

Based on Rasa

About 50% of the ingredients of the formulation contain *Tikta rasa* (astringent taste). 40% of the ingredients have *Kashaya rasa* (astringent taste), 20% of the ingredients have Katu rasa.

Based on Guna

47% of the ingredients of the formulation have *Laghu Guna* (light), 33% of them having *Ruksha Guna* (dry), about 13% of the ingredients contain *Tikshna Guna* (Sharp properties) and 7% of them contain *Snigdha Guna* (Unctuous).

Based on Virya

In this formulation 57% of the ingredients have *Shita Virya* (Cold potency) and 40% of them are having *Ushna Virya* (Hot potency).

Based on Doshakarma

In Vrishadi Lepa, 64% of the ingredients have *Kaphapitta Samaka*, 21% of them are *Vata Samaka*, and 15% of them are *Vata Kapha Samaka karma*.

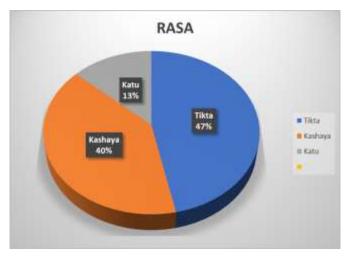


Figure 1

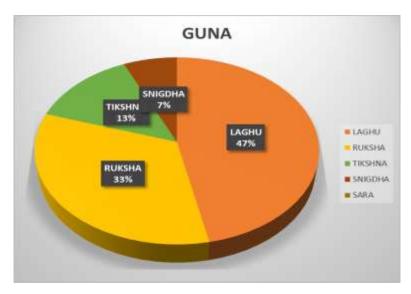


Figure 2.

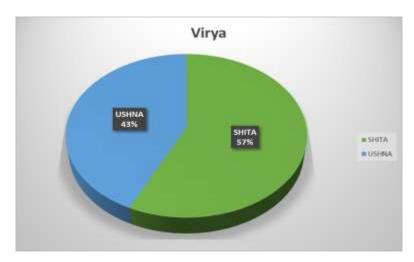


Figure 3.

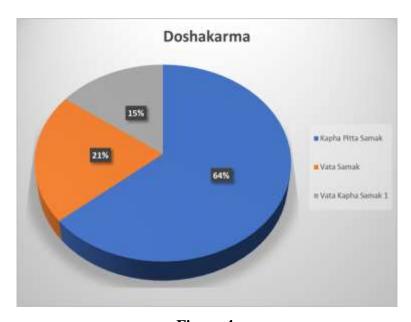


Figure 4.

DISCUSSION

Dadru Kushta is the prevalent disease in developing countries such as India, with the majority of the population living in unhygienic conditions. Dadru has mentioned nearly all the Acharyas along with their management. Thus, Ayurveda is able to cure the disease of the skin like Dadru Kushta. As this is one among the relapsing type of skin disease so patient was advised to follow Pathyaapthya like Ahara, Vihara, Achara, Vichara.

Vrishadi Lepa is mentioned to treat the patients of Kustha (obstinate skin disease). The formulation is simple with only a few ingredients which are very easily available. Dadru is Pitta Kapha Pradhana Vyadhi. As the ingredients of the formulations are Tikta and Kashaya rasa dominated, it helps to pacify Pitta Dosha. Whereas, Katu, Tikta, Kashaya rasa pacifies Kapha Dosha. In Dadru Kustha, Rasa, Rakta, Mamsa, Ambu, are the main Dushya. Rasa dhatu dushti is produced by Rasa Dhatwagnimandya and Jatharagnimandya. Karma like Dipana, Pachana and Agni that produce proper Rasa Dhatu which correct Kapha as it is Aashraya of Rasa Dhatu the drugs like Saptaparna, Karanja & Kutaja having properties like Dipana, the drugs having Kusthaghna and Rakta Pittahara properties are Nimba, Vasa, Saptaparna, Khadira and Karaveera. All the ingredients have the Laghu, Ruksha and Tikshna Guna help for fast spreading and penetration of the medicines thus providing faster action. It also helps to correct the vitiation of Mamsa Dhatu. Snigdha Guna (Unctuous property) provides strength as Rogi bala (patient strength) will be reduced in Dadru Kustha.

Katu (pungent) Vipaka subside the increased Kapha Dosha which is predominantly affected in Dadru Kustha. This formulation having Shita Virya (cold potency) which act as Piitahara as well as Rakta Prasadaka and Stambhaka Karma, whereas Ushna Virya (hot potency) helps to balance Kapha and Vata Dosha, hence equilibrium is maintained. This lepa is also having Krimighna, Vishaghna, Kandughna properties. Dadru is Kapha dominant. Upon topical application, the active principles of the lepa reach to the deeper tissue through Siramukha and Swedavahi Srotas and stain it with its Sukshma and Tikshna Property. Most of the ingredients have Kapha Pitta samaka, Vata samaka and Vata Kapha samaka, Vedanasthapana, Ruchya, Kandughna, Vishaghna and Rasayana properties. This article explores the potential application of Vrishadi Lepa, a traditional Ayurvedic formulation, in managing dermatophytosis/Tinea, a prevalent skin condition in developing countries like India.

CONCLUSION

Dadru Kustha is a specific skin condition that is clinically replicated by dermatophytosis or tinea. It can be concluded that the use of Vrishadi Lepa mentioned by Acharya Charaka and Harita are effective in the management of Dadru Kustha. It is a herbal formulation where the majority of the ingredients mainly have Kapha Pittahara, Kusthaghna, Kandughna & Krimighna properties. Hence it can be used in Dadru Kustha. Majority of the patients prefer to get their skin diseases treated with topical administration of drugs rather than their systemic. Lepa Kalpana is an excellent scientific method of introducing the active principles of drugs to target the cells for a quick and effective healing process. The proposed mechanism of action involves the combined effects of Vrishadi Lepa constituent herbs, with anti-inflammatory (*Pitta*-balancing) and antimicrobial (*Kapha*-balancing) properties. Further research is necessary to validate these claims through in-vitro and in-vivo studies focusing on the phytochemical constituents and their efficacy against relevant pathogens associated with dermatophytosis. It's important to acknowledge that complete eradication of pathogens in chronic skin conditions like dermatophytosis may be challenging. Therefore, alongside Vrishadi Lepa, maintaining proper hygiene remains a critical element in successful management. Future research directions could explore the synergistic effects of Vrishadi Lepa with conventional therapies and investigate potential long-term maintenance strategies for optimal patient outcomes.

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