



**ORIGINAL RESEARCH PAPER**

**Ayurveda**

**“A CASE STUDY OF DUSHTA VRANA TREATED WITH KANTAKRAMAKA LEPA”**

**KEY WORDS:** Vrana, Wound, Wound healing, Dushta vrana

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**ABSTRACT**

Wound healing is a crucial and natural bodily function. In today's world, the most challenging task for any surgeon is to successfully cure a wound. Wounds can destroy the natural structure and function of the skin and underlying soft tissues, and are caused by trauma, infection, and chronic mechanical stress. It can be categorized into two parts: acute and chronic. Correct vascular supply, cure infection, clear of necrotic tissue, and moist are all required for wound healing, but certain wounds do not heal with proper management this condition is known as Dushta Vrana. Dushta Vrana is associated with non-healing ulcers in Ayurveda. Ayurveda is an ancient discipline of herbal medicine and surgery that offers a wide range of wound healing treatments. Our Acharyas provided a thorough overview of wound management principles and classified medications linked to Vrana shodhana and Vrana ropana. In this case study of a 56-year-old female patient having dushta vrana with chief complained of several infected lesions in her right leg with pain, discharge, slough, unpleasant odour and skin discoloration.

**INTRODUCTION:-**

Vrana is a disorder characterised by Vedana (pain), Srava (discharge), and Vikriti (tissue deterioration) and is linked to Dhātu nasha (tissue destruction) (deformity). Dushta-Vrana is a long-standing and unhealed Vrana. Vrana is caused by a number of various circumstances. According to Acharya Sushruta, wounds on the skin would heal quickly, while wounds on other Dhatus, such as Mamsa (muscle) Shira, are difficult to treat. For the treatment of various types of wounds, Acharya Sushruta has detailed sixty different upakramas. Under dusta vrana, he has characterised specific types of wounds that have been reduced to a state where healing is delayed or nonexistent due to external or internal reasons. Dushta is a condition in which the doshas are localised, or dushta implies being vitiated by the doshas. Dushta is a Vrana that smells unpleasant (foul scent), has an odd pigmentation with profuse discharge, extreme pain, and takes a long time to cure. In this paper, we provide a single case study on dushta vrana (non-healing wound) that showed significant results.

**CASE REPORT:-**

**Types of Study:** Clinical observational single case design.

**Clinical Study centre:**

OPD/IPD of Shalya Tantra Department, Dr. Sarvepalli Radhakrisnan Rajasthan Ayurveda University, Jodhpur (Raj).

A 56-year-old female patient having dushta vrana before three months with chief complained of several infected lesions in her right leg with pain, discharge, slough, unpleasant odour and skin discoloration. It measures about 25 cm in length. The wound was treated by a local doctor with antibiotic ointment, but he did not respond. The patient was also taken to a few hospitals for symptomatic treatment, but the treatment did not respond. At last, he came for Ayurvedic management at Shalya Tantra Department of Dr. Sarvepalli Radhakrisnan Rajasthan Ayurveda University, Jodhpur.

On physical examination, the patient's general condition was good; his pulse, blood pressure, and respiration rate were all within normal limits. There was no previous history of allergies, diabetes or hypertension.

**AIMS AND OBJECTIVES:**

The main objective of this review article is to put up the spot light on the traditional principles of management of the Dushta vrana. The emergency event of post operative complications and surgical infections as well as trauma care unwinds a wide scope of adopting the traditional principles in present modern era.

**MATERIAL AND METHODS:-**

In this study Kantakramaka Lepa was used for local application.

**Contents of Kantakramaka Lepa:**

Nagarmotha Churna and Shatdhautā Ghrita.

**Treatment Plan:-** Wound was cleaned (Shodhana) with Triphala Kwath daily, Kantakramaka Lepa was applied locally after thorough cleansing with sterile swabs, and dressing was done once day with sterile gauze and bandage.

**Duration of treatment:** The treatment was remains continue for a total of 5 weeks.

**Preparation of Drug:-**

Kantakramala lepa is made from the compound of musta and shatdhotghrita.

कांतकामकमेकं सुस्वक्ष्णं गव्यसर्पिका पिष्टम् ।  
शमयति लेपान्नियतं व्रणमागन्तुजं न सन्देहः ॥

(च. द. व्रणशोथ वि. 44 / 51)

**Ayurvedic Properties:**

|             |                      |
|-------------|----------------------|
| Rasa        | Tikta, Katu, Kashaya |
| Guna        | Laghu, Ruksha        |
| Veerya      | Sheeta               |
| Vipaka      | Katu                 |
| Doshaghanta | Kapha pitta shamaka  |

Nagarmotha and shatdhotghrita are two medications used to make Kantakramaka lepa. First and foremost, Nagarmotha is ground into powder using a kharala/grinder. After then, the Nagarmotha powder was refined using a sieve or cloth.

Shatdhotghrita is made with cow ghrita in the second procedure of kantakramaka lepa. In this method, cow ghrita is washed a hundred times with cold water to turn it to cream form. By doing so, all of the impurities are eliminated, and the ghee is stored for a long period.



The common name for Nagamota is "nutgrass". It has a unique fragrance and is often used to cook spices, perfumes, and incense. If used in the right dosage, Nagarmotha's Deepan and Pachan qualities aid improve digestion, according to Ayurveda. Nagarmotha oil is a useful home treatment for stomach disorders because of its antispasmodic and dissipative qualities. Due to their astringent properties, Nagarmotha powder and coconut oil help reduce swelling and prevent bleeding from wounds. Nagarmotha's antimicrobial qualities help it fight bacterial and fungal diseases.

**Parameters of assessment:-**

The patients were assessed on the basis of some parameters before and after the treatment as mentioned below-

**Vedana (Pain):-**

| Gradation |         | Symptoms        |
|-----------|---------|-----------------|
| Grade-0   | 0 (-)   | "No Pain"       |
| Grade-1   | 1 (+)   | "Mild pain"     |
| Grade-2   | 2 (++)  | "Moderate pain" |
| Grade-3   | 3 (+++) | "Severe pain"   |

**Daha (Burning):-**

| Gradation |         | Symptoms                       |
|-----------|---------|--------------------------------|
| Grade-0   | 0 (-)   | "No burning"                   |
| Grade-1   | 1 (+)   | "Mild burning for sometimes"   |
| Grade-2   | 2 (++)  | "Moderate continuous burning"  |
| Grade-3   | 3 (+++) | "Continuous burning sensation" |

**Gandha (Smell):-**

| Gradation |         | Symptoms                 |
|-----------|---------|--------------------------|
| Grade-0   | 0 (-)   | "No smell"               |
| Grade-1   | 1 (+)   | "Minimum bad smell"      |
| Grade-2   | 2 (++)  | "Tolerable foul smell"   |
| Grade-3   | 3 (+++) | "Intolerable foul smell" |

**Shoth (Inflammation):-**

| Gradation |         | Symptoms                |
|-----------|---------|-------------------------|
| Grade-0   | 0 (-)   | "No inflammation"       |
| Grade-1   | 1 (+)   | "Mild inflammation"     |
| Grade-2   | 2 (++)  | "Moderate inflammation" |
| Grade-3   | 3 (+++) | "Severe inflammation"   |

**Srava (Discharge):-**

| Gradation | Symptoms   |
|-----------|--|
| Grade-0   | 0 (-) No discharge / Dry dressing                                  |
| Grade-1   | 1 (+) The gauze is slight moist                                    |
| Grade-2   | 2 (++) The gauze is completely wet within 24 hours                 |
| Grade-3   | 3 (+++) The gauze is completely wet in 24 hours and need to change |

**Varna (Colour):-**

| Gradation |         | Symptoms       |
|-----------|---------|----------------|
| Grade-0   | 0 (-)   | "Twaksavarna"  |
| Grade-1   | 1 (+)   | "Kapota varna" |
| Grade-2   | 2 (++)  | "Shwetakta"    |
| Grade-3   | 3 (+++) | "Krishana"     |

**Parimaan (Size of wound):-**

| Gradation |         | Symptoms                         |
|-----------|---------|----------------------------------|
| Grade-0   | 0 (-)   | Healed                           |
| Grade-1   | 1 (+)   | Within 0-3 cm <sup>2</sup>       |
| Grade-2   | 2 (++)  | Within 3-6 cm <sup>2</sup>       |
| Grade-3   | 3 (+++) | Within 6 cm <sup>2</sup> & Above |

Overall effect of trial was assessed as "Complete Healed", "Marked improvement", "Moderate improvement", "Mild improvement" and "No improvement" by accepting the following criteria :-

| Gradation            | Symptoms  |
|----------------------|---|
| "Complete Healed"    | 100% relief in chief complaints                                     |
| "Marked Improvement" | 75-99% relief in chief complaints is regarded as marked improvement |

|                        |   |
|------------------------|---|
| "Moderate Improvement" | 50-74% relief in chief complaints is regarded as moderate improvement |
| "Mild Improvement"     | 25-49% relief in chief complaints is regarded as mild improvement     |
| "No Improvement"       | Less than 25 % in chief complaints or symptoms                        |

**RESULT DATA OF CLINICAL TRIAL:**

(Table No. 1)

| Chief Complaints | 1 <sup>st</sup> week |      | 2 <sup>nd</sup> week |      | 3 <sup>rd</sup> Week |      | 4 <sup>th</sup> Week |      | 5 <sup>th</sup> Week |      |       |
|------------------|----------------------|------|----------------------|------|----------------------|------|----------------------|------|----------------------|------|-------|
|                  | B.                   | A.T. | D.1                  | A.T. | D.2                  | A.T. | D.3                  | A.T. | D.4                  | A.T. | D.5   |
| Vedana           | 3                    | 3    | 0                    | 2    | 1                    | 2    | 1                    | 2    | 1                    | 1    | 2     |
| Daha             | 2                    | 2    | 0                    | 2    | 0                    | 1    | 1                    | 0    | 2                    | 0    | 2     |
| Gandha           | 2                    | 2    | 0                    | 1    | 1                    | 1    | 1                    | 0    | 2                    | 0    | 2     |
| Shotha           | 2                    | 2    | 0                    | 1    | 1                    | 0    | 2                    | 0    | 2                    | 0    | 2     |
| Shrava           | 2                    | 2    | 0                    | 2    | 0                    | 1    | 1                    | 0    | 2                    | 0    | 2     |
| Varna            | 3                    | 3    | 0                    | 3    | 0                    | 1    | 2                    | 1    | 2                    | 1    | 2     |
| Parimana         | 3                    | 3    | 0                    | 3    | 0                    | 2    | 1                    | 2    | 1                    | 1    | 2     |
| Total            | 17                   | 17   | 0                    | 14   | 3                    | 8    | 9                    | 5    | 12                   | 3    | 14    |
| % of Relief      |                      |      | 0%                   |      | 17.6%                |      | 53.9%                |      | 70.6%                |      | 82.4% |



(Figure 1 showing before treatment, during treatment and after treatment)

**RESULTS:-**

By the end of the second week, the clinical aspects of *Dushta Vrana* had improved, and the wound had healed almost by the end of the 5th week, leaving some little scar. Throughout the follow-up period, no evidence of recurrence was discovered.

**DISCUSSION:-**

**Effect on Vrana Vedana:-** Before treatment the patient had come with severe pain. Pain was rapidly reduced at the end of treatment i.e. 5<sup>th</sup> week from severe to mild.

**Effect on Daha:-** Before treatment the patient had come with moderate continuous burning (*Daha*) condition. Burning was started to reduce from 3<sup>rd</sup> week treatment and completely reduced at the end of 4<sup>th</sup> week.

**Effect on Gandha:-** By the conclusion of the fourth week, the unpleasant odour that existed at the start of treatment had totally vanished.

**Effect on Shotha:-** Before treatment the patient had come with moderate inflammation (*Shotha*) condition. At the end of 3<sup>rd</sup> week inflammation was completely reduced.

**Effect on Shrava:-** Profuse, Purulent discharge present at the beginning of treatment. At the end of 4<sup>th</sup> week purulent discharge was completely discontinued.

**Effect on Varna:-** Before treatment the patient had come with several infected lesions in her right leg. Many of infected lesions were like *krishana* (Blackish) in colour. At the end of 5th week, slough was almost changed and colour was converted *krishana* to like *Kapota* (Gray) colour.

**Effect on Parimana:-** At the end of the treatment, *Vrana* almost healed with minimal scar. *Kantakramaka lepa* was aided in the reduction of wound size by increasing healing and contraction rate.

**Probable mode of action of Kantakramaka Lepa:-**

The presence of active terpenoids, flavonol glycosides, and  $\beta$ -sitosterol in the tuber component of Nagarmotha may be more useful in reducing tissue swelling and seeping of tissue fluids accompanying inflammation demonstrated a significant healing profile.

The antibacterial properties of Nagarmotha are highly useful in protecting against bacterial and fungal illnesses.

Nagarmotha's astringent qualities assist to reduce swelling and halt bleeding from wounds.

**CONCLUSION:-**

The local application of *Kantakramaka lepa* was determined to be significant effective in the management of *Dushta Vrana* based on the findings of this case study. *Kantakramaka lepa* has a high efficacy in *Vrana Shodhana* and *Vrana ropana* with fine scarring, no side effects, and alleviation from *Dushta Vrana* signs and symptoms. As a result, it can be used as an alternate *Ayurvedic* remedy for *Dushta Vrana*.

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