



A CRITICAL ANALYSIS OF JALAUKAVACHARANA (LEECH APPLICATION):- A SCIENTIFIC REVIEW

Suman Lata¹, Satyendra Kumar Tiwari²

¹M.D Scholar, Department of Panchakarma, G.A.C.H, Patna

²Professor, Department of Panchakarma, G.A.C.H, Patna

Corresponding Author: slatasuman159@gmail.com

<https://doi.org/10.46607/iamj0612102024>

(Published Online: October 2024)

Open Access

© International Ayurvedic Medical Journal, India 2024

Article Received: 08/09/2024 - Peer Reviewed: 29/09/2024 - Accepted for Publication: 13/10/2024.



ABSTRACT

Two fundamental tenets of Ayurveda medicine are Shaman Chikitsa (internal medicine) and Shodhan Chikitsa (elimination therapy). Shodhan Chikitsa treats the five panchakarmas, or purification, procedures. Acharya Susruta included Raktamokshana in Panchakarma and said that it was the most excellent method because it removed Pitta, Kapha, and Vata, the three vitiated Doshas. Leeches are utilised in Jalaukavacharana, a kind of Raktamokshana, to enable blood flow. Since vitiated Doshas are removed from the body without the need for any cutting tools, this method of Raktamokshana is seen to be the most successful and distinctive. Raktamokshana, using "Leech", falls within the Ashastra category.

Keywords: Shodhan, Panchakarma, Jalaukavacharana, Raktamokshana

INTRODUCTION

Leech therapy, or Jalaukavacharana, was first described in 800 B.C. Sushruta Samhita. Numerous studies conducted recently have demonstrated that leech.

Saliva contains various bioactive substances, such as

anti-platelet (calin), anti-thrombin (Hirudin, bufrudin), factor Xa inhibitors, antimicrobial, and other properties. An old Ayurvedic bloodletting method called "jalaukavacharana," or "leech therapy", has excellent potential to treat a wide range of ischemic,

viral, and inflammatory illnesses. Numerous physiologically and pharmacologically active substances found in leech saliva have anticoagulant, antiplatelet, anti-inflammatory, and anti-edematous effects on the host's body. Leech therapy is beneficial for several conditions, including ischemic heart disease, arthritis, venous congestion, vascular disorders, and abscesses.

Jalauka Definition

Nirukti of Jalauka – (definition of leech)

Jala – water

Aayu – Life

As they are accustomed to water, they are called Jalauka.

Leech modern view

Phylum – Annelida

Class – Hirudinea

Scientific name – *Hirudo medicinalis*

Habitat – Water

Leech types

Types of leeches: 12 types

6 Poisonous – Krishna, Karbura, Alagardha, Indradudha, Samudrika, Gochandana

6 Non-Poisonous – Kapila, Pingala, Sankhamuki, Mooshika, Pundareekamuki, Savarika

INDICATIONS

Indications for Leech Therapy

- Blood vitiated with pitta dosha children, old aged,
- frightful, debilitated women and persons with tender
- constitution,
- Diabetic ulcers
- Varicose veins
- Sciatica
- Vatarakta
- Acne
- Chronic skin conditions like eczema and psoriasis.
- Herpes
- Poison
- Abscess
- Tumors of the abdomen (Gulma)

- Haemorrhoids
- Diseases of the neck and eyes
- Therapeutic actions
- Therapeutic Action of Jalauka Therapy:
- Anti-inflammatory
- Analgesic (reduces pain)
- Increases blood circulation
- Thrombolytic (dissolves blood clot)
- Antimicrobial activity

Procedure of Jalaukavacharana

1. Poorvakarma

- a) Collection and preservation of leeches,
- b) Examination of the patient,
- c) Shodhana of leech,
- d) Preparation of patient

2. Pradhana Karma

For Jalaukavacharana, the patient should either be sitting or lying down. To determine whether the leech is free of Mada, Haridra and Sarshapa Kalka should apply the leech and place it in a pot with clean water for a while. The patient's afflicted area is then treated with that leech. If the leech cannot hold or suckle in the damaged area, a little scratch or application of milk drop should be made to remove a small amount of blood. Try another one if the leech doesn't perform poorly using the techniques above.

As soon as the leech begins to draw blood, a piece of gauze or white fabric should be placed over its face. Continuously pour water into the leech, drop by drop, to keep it extremely chilly. As soon as the leech starts to draw blood, its midsection will swell; it should be mentioned that it draws unclean blood first. When a patient is drinking pure blood, Saindhava Lavana should be applied to the mouth to relieve any prickling pain or itching.

3. Paschat Karma

It consists of two main things,

- a) Jalauka Upachara
- b) Atura Upachara

a) Jalauka Upachara
When the patient's injured area is free of Jalauka, its mouth and body should be treated with taila combined with Saindhava Lavana. The tail end of the jalapeño should be grasped using the left hand's forefinger and thumb and then squeezed toward the head with the right hand's forefinger and thumb. This will cause it to regurgitate the blood it sucked. After that, place the Jalauka in a container with clean water.

It should be seen whether the jalauka has vomited all of the blood it has swallowed while it is moving within the vessel. If it is lethargic, it is likely that it has not yet properly vomited (Madayukta).

b) Atura Upachara

Due to the anticoagulant hirudin's property, when a Jalauka is about to suck someone's blood, the blood will not clot, making it easier for the sucked blood to enter the Jalauka's alimentary canal.

Learn the telltale signs and symptoms of appropriate bloodletting, Vaidya. Shatadhouta Ghrita, Madhu, or Pichu dipped in Shatadhouta Ghrita should be put to the wound as soon as the leech is extracted. The wound should be treated with cold application, bandaged, and tied securely. Alternatively, after the jalauka has separated from the body, the wound could be washed with Kashaya or any other Taila, such as Jatyadi Taila or Padmakadi Taila.

Things to keep in mind when applying for Jalauka

1. Local Swedana and Snehana are required before filing for a Kalauka.
2. Jalauka should be used in the morning in Pratahalkala. Pitta Vriddhi in the afternoon and Vata Prakopa at night will promote quick circulation, and there's a possibility of Ati Rakta Sravana.
3. Refrain from applying delicate organs such as the shishna, stana, sira, etc.
4. One Jalauka can be used for up to two years, and the remaining six to ten Jalaukas can be used for the remaining time.

Leech retention following therapy

Leech is forced to throw up the extracted blood. To ensure that it is held firmly, rice flour is dusted over it. Its body was gradually kneaded to vomit the blood it had swallowed up with its left hand at the end and its right thumb and index finger. Keep the leech in a pot of water to determine whether the vomiting is complete. If the leech moves slowly, it signals incomplete vomiting; if it moves quickly, it is complete. It stays in pure water.

Unfit leeches

Leeches are not appropriate for therapeutic use.

As per Acharya Sushruta, poisonous leeches have a large abdomen, an unsightly appearance, are thick, move slowly, do not bite, and take very little blood.

Leeches inert in water and not entirely vomited blood should also be refused when applied repeatedly.

The amount of blood sucked by leeching 5-15 ml of blood.

Complications and treatment are due to poisonous leeches, irritation, itching, bleeding, rashes, and fever.

Treatment

'Mahagrutha' can be applied internally and externally.

DISCUSSION

When Shastra karma is contraindicated, Anushastras such as taluka can be applied. The primary application of hirudin medicines (Nirvisha Jalauka) is in humans. The main reason jalauka are employed in Pitta Dosha Vikriti is that they are Madhura Rasa Yukta, which means they are suitable for Pitta Prakriti individuals and may be found in cool, pure water.

Similar to how Hansa birds remove milk from water and only consume milk, Jalaukas initially suck polluted blood before consuming pure blood.

Shringa, Jalauka, Prachhanna, and Alabu act locally, whereas Siravyadha acts broadly. This Jalauka can be applied locally to the affected area to treat various Raktaja illnesses. Not only does hirudin have an anaesthetic and vasodilatory effect, but it also involves several other enzymes, including collagenase, apyrase, hementin, bdellin, egilin, decrosin, hayluronidase, and orgelasel.

CONCLUSION

1. Jalaukavacharana is considered one of the greatest Anushastras. It is mostly used for disorders with a Pitta Dosha predominance.
2. Rakta Pradoshaja Vyadhis are the primary users of Chikitsa.
3. Despite being localised, the activity releases numerous components into the bloodstream, which impacts the entire body.
4. Because jalaukavacharana contains certain elements, it can be utilised to treat infectious diseases, making it safe.
5. Jalaukavacharana is less time-consuming, less expensive, and more straightforward for patients to follow.
6. One of the safest and most effective therapies is leech. The quick and inexpensive operation doesn't interfere with the patient's regular activities.
7. Leeches are the best application due to their purifying, fast-acting, readily available, delicate, and easy application.

8. The ideal use is leech because of its purifying, fast-acting, readily available, delicate, and easily applied character.

9. Pre-operative measures such as anaesthesia and antibiotics are not required, and patients can quickly leave the hospital.

10. The patient never feels as though a significant procedure is over.

11. In rural locations, leeches can be a blessing. They are considered the best para-surgical and cosmetic tools.

12. Native leeches are highly renowned in the medical sector despite their small size.

REFERENCES

1. Sushruta Samhita, Ayurveda Tattva Sandeepika, Kaviraj Dr Ambikadutta Shastri, Sutra Sthan, 13/23.
2. Sushruta Samhita, Ayurveda Tattva Sandeepika, Kaviraj Dr Ambikadutta Shastri, Sutra Sthan, 13/24.
3. Sushruta Samhita, Ayurveda Tattva Sandeepika, Kaviraj Dr Ambikadutta Shastri, Sutra Sthan, 13/10.
4. Sushruta Samhita, Ayurveda Tattva Sandeepika, Kaviraj Dr Ambikadutta Shastri, Sutra Sthan, 13/18.
5. Sushruta Samhita, Ayurveda Tattva Sandeepika, Kaviraj Dr Ambikadutta Shastri, Sutra Sthan, 13/09.
6. Sushrut Samhita, Ayurveda Tattva Sandeepika, Kaviraj Dr Ambikadutta Shastri, Sutra Sthan, 13/22.

Source of Support: Nil

Conflict of Interest: None Declared

How to cite this URL: Suman Lata & Satyendra Kumar Tiwari: A critical analysis of jalaukavacharana (leech application): - a scientific review. International Ayurvedic Medical Journal {online} 2024 {cited October 2024} Available from: http://www.iamj.in/posts/images/upload/1845_1848.pdf