



# Management of Alopecia Areata Through Micro Needling Along with Cupping

Amol Deshpande<sup>1\*</sup>, Mayuri Deshpande<sup>2</sup>, Minakshi Urkude<sup>3</sup> and Dipika Chakole<sup>2</sup>

<sup>1</sup>Department of Rachana Sharir, Mahatma Gandhi Ayurved College and Research Centre, Datta Meghe Institute of Higher Education and Research (Deemed to be University), Wardha - 442001, Maharashtra, India; deshpendeamol86@gmail.com

<sup>2</sup>Department of Kayachikitsa, Mahatma Gandhi Ayurved College and Research Centre, Datta Meghe Institute of Higher Education and Research (Deemed to be University), Wardha - 442001, Maharashtra, India

<sup>3</sup>Department of Agadtantra, Mahatma Gandhi Ayurved College and Research Centre, Datta Meghe Institute of Higher Education and Research (Deemed to be University), Wardha - 442001, Maharashtra, India

## Abstract

*Ayurveda* considered Alopecia areata as a minor ailment but now in this era of presentation looks are very important. Everyone wants to be beautiful and attractive. Hairs and skin are the mirror of beauty. If these two things are healthy and beautiful then the person looks more beautiful. An 18-year-old boy came to OPD with patches of baldness over his scalp. He has taken 'n' no. of treatment modalities for Alopecia areata but the results were not mesmerizing. The patient was advised to do microneedling with cupping for his baldness. According to the Pull and Tug test and SALT criteria, the patient had a 40% area of baldness at the center. After obtaining consent, the procedure was done thrice in 15 days. Along with this, internal medication with local application of oil was going on. In Internal medication, *Asthimajja pachak* (herbal drug combination), *Praval Panchamrit* (sea-origin calcium supplement), and *Krumikurthar rasa* (herbs-mineral drug) were given. After 4 months, with 15 sitting of microneedling with cupping, the patient had normal and healthy hair growth. Micro-needling along with internal medication is the best, cost-effective, and less invasive solution for re-growing hairs over high-cost hair treatments and transplantation.

**Keywords:** Acupuncture, *Ayurveda*, Alopecia Areata, Baldness, Cupping, Herbal Drugs, *Indralupta*, Microneedling, *Vidhakarman*

## 1. Introduction

There are various diseases that cause deterioration of attractive facial presentation. Acne vulgaris, and baldness are common among them. Acne vulgaris can be overcome with the time period usually. Baldness can't be overcome with time and requires effective treatment in the early stage. In *Ayurveda*, *Indralupta* has the same signs as Alopecia areata.

Alopecia areata is considered in Minor ailment by *Ayurveda* scholars<sup>1</sup>. The numbers of minor ailments are different in different *Ayurveda* literature. According to *Ayurveda*, there is a relation between

hairs, *Dosha* (regulatory functional factors of the body), *Dhatu* (tissue), and *Mala* (waste products). In Alopecia areata, there is vitiation of *Vata*, *pitta*, and *kapha*. There is *Vata* (*Dosha* responsible for movement and cognition) and *Pitta* (*Dosha* responsible for regulating body temperature and metabolic activities) vitiation causing hair fall and *Kapha* (responsible for nourishment) and blood tissue causing hampering of hair growth. Hairs get their nourishment directly from the skin. The health of the skin is dependent on the primary product of digested food. Along with this, Tissues also play an important role in the health of the hairs. Good fat element individuals have oily

\*Author for correspondence

skin, hairs, and body hairs. As hair is a by-product of Bone tissue and the minor structural components that stabilize and sustain the body of nervous tissue, the vitiation in bone tissue causes various diseases of hairs such as falling, and greying of hairs<sup>2</sup>. Acharya Charak has described it in *Trimarmiya Chikitsa Adhyay*. According to him, AA occurs after Chronic rhinitis. Acharya Sushruta has described AA as a synonym for hair fall. Acharya Harita described it as the destroyer of hairs. In *Ayurveda*, there is a complete line of treatment for Alopecia areata. Acharya Sushruta has advised hair pack, bloodletting, oleation, and detoxification in his *Samhita*. Acharya Charaka has stressed on avoidance of causative factors as a treatment. Along with this, there is a description of the instillation of medicine through the nasal route, detoxification, and hair pack. Apart from this, there is a description of oil application overhead, fumigation and hair cutting, and nail cutting in routine hair care<sup>3</sup>. According to modern medicine, Alopecia areata is an autoimmune disorder in which there is patchy or complete hair loss with non-scarring features. The common site is the scalp. The main culprit in Alopecia areata is an inflammatory peribulbar region with lymphocytic infiltrate<sup>4</sup>. The treatment for AA is intralesional corticosteroids like triamcinolone acetonide, Topical corticosteroids like clobetasol propionate foam, desoximetasone cream 0.25%, Minoxidil, Anthralin 1% for short period, Topical immunotherapy, phototherapy. Cyclosporin, methotrexate, and psychosocial therapy is also given to the patient. According to modern science, the relapse rate is more<sup>5</sup>.

Here is the patient of age 18 years who had alopecia areata and was successfully treated within 4 months. The patient was treated with microneedling along with cupping. Microneedling in *Ayurveda* is a minor para-surgical procedure with umbrella effects. In this, a 26 G needle is pricked in the affected area and removed with all aseptic precautions taken.

## 2. Case Report

### 2.1 Patient Information

An 18-year-old male patient came to OPD of Dirghayu Ayurved Chikitsalay and Panchkarma Centre, Ramnagar, Wardha with complaints of non-scarring,

and bald patches on the scalp for the last 1 year. There were no other related symptoms to the patient.

### 2.2 Clinical Findings

The patient was apparently good and healthy 1 year back. Then he started hair fall in gross quantity. When the patient came to OPD, he was thoroughly examined, and a complete history was taken. The patient was supportive, and oriented to time and place.

### 2.3 Timeline

The patient has taken a complete course of Ayurvedic medicine for four months. The timeline can be seen in Table 1.

### 2.4 General Examination

The Patient was afebrile, Temperature – 96.3, Pulse – 88 / min, Respiratory rate - 18 / min, and Blood pressure – 110/80 mm of Hg.

### 2.5 Systemic Examination

In the respiratory system, the chest was clear B/L AEBS (Air Entry Bilaterally Symmetrical); in the cardiovascular system, S1, S2 was audible, and no abnormal sounds were detected. He was conscious and well-oriented.

### 2.6 Diagnostic Assessment

Objective criteria – SALT (Severity of Alopecia Tool) criteria are used for the assessment of baldness<sup>6</sup>. In this criteria hair loss from the Left Lateral scalp region or from the right lateral scalp region it is considered as 18% each, it is at the top of the scalp region is considered as 40% hair loss whereas in the posterior region, it is considered as 24 % Hair loss.

In this case, total hair loss was in 40% area of the total scalp.

**Table 1.** Timeline

<b>16/4/2022</b>	The patient noticed one patch on his head at the temporal region.
<b>18/4/2022</b>	He went to a general practitioner in the same regard and took medicine for about 5 months with no improvement in symptoms.
<b>22/10/2022 to 12/3/2023</b>	He came to OPD of Deerghayu Ayurved Chikitsalay and Panchkarma Centre, Ramnagar, Wardha, Maharashtra, India, and complete <i>Ayurved</i> treatment was started and successful results were obtained.

## 2.7 Therapeutic Intervention

The patient was treated with complete *Ayurvedic* (Indian conventional way of treatment) modalities. (Table 2)

Following treatment modalities were used in the patient.

### 2.7.1 External Therapy

Micro-needling with 26 and a half no. needle is done on the affected area of the scalp of the patient in an aseptic condition. Then cupping is done locally (Figure 1). This was done two times per fortnight.



**Figure 1.** Process of cupping.

### 2.7.2 Internal Medicine

*Asthimajjapachak vati*, *Pravalpanchmrita*, and *Krumikuthar rasa* were used internally for complete 4 months (Table 2).

## 2.8 Follow-up and Outcome

The patient was advised to visit OPD after every 15 days. The hair roots were visible from 45 days of treatment. After four months Improvement in the SALT criteria is from 40% hair loss to 0 % as normal hair growth was observed over the whole scalp (Figure 2 and Figure 3).

## 3. Discussion

Alopecia areata is a common hair disorder nowadays. While treating Alopecia areata patience is very important on doctor's as well as the patient side.

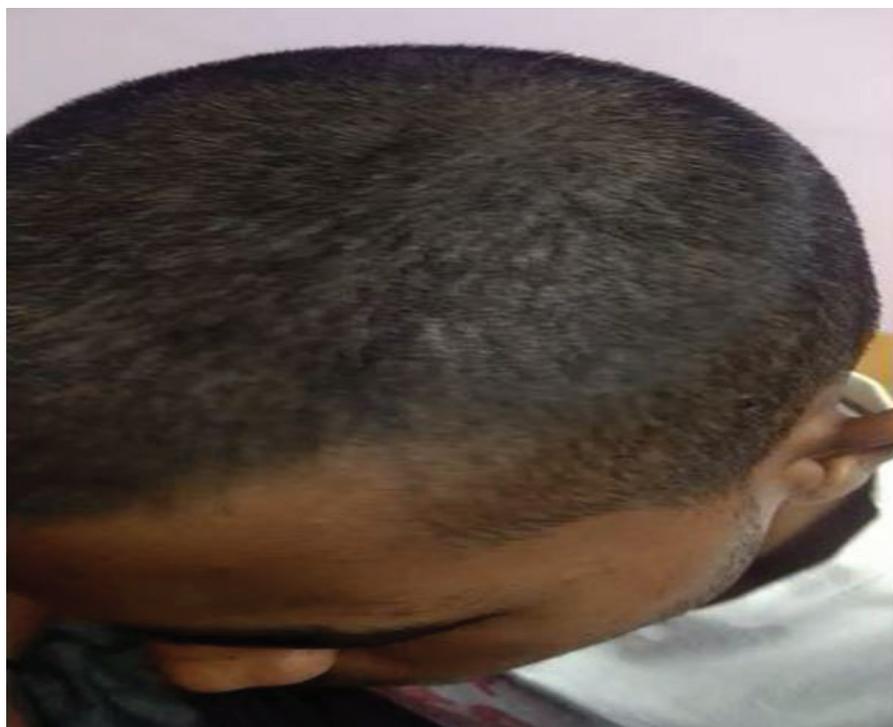
According to *Ayurveda*, *Mala* is the umbrella concept that not only means waste product. *Kesha* (Hair) is the *mala* of Bone tissue. So proper metabolisms is important for good excretory product formation<sup>7</sup>. While treating hair-related disorders, Bone tissue channels should be taken in view of treatment. In a deep-rooted disease, *Dhatupachakyog* (herbal formulation) can be used according to the involvement of tissues. In *Charaksamhita* and *Ashtanghridaya* there is a description of *Dhatupachak kadha* in the context of a chapter related to fever. It contains *Tinospora cordifolia*, *Embllica officinalis* and *Cyprus rotandus*<sup>8</sup>. *T. cordifolia* is used from ancient times in India. It is used for rejuvenation purposes, as an immune modulator, and an antioxidant. It is good for stress management and inflammatory conditions<sup>9</sup>. *Embllica officinalis* is an antioxidant and rejuvenator. It is advised in hair treatment from ancient times. It mainly rejuvenates the body and keeps the body young. Along with this, it pacifies *Vata*, *Pitta*, and *Kapha* which are the main

**Table 2.** Detailed treatment plan

Type of treatment	Drug name	Dose	Administration time	Duration	Anupana
External	<i>Vedhana karma with Raktamokshan Alabu</i> (Cupping)	Twice in 15 days		4 months	
	<i>Tail application</i>	Regularly			
Internal	<i>Asthimajjapacha kvati</i>	250 mg 2 tabs	BD after meal	4 months	Lukewarm water
	<i>Pravalpanchmrit</i>	125 mg 2 tabs	BD after meal	4 months	Lukewarm water
	<i>Krumikuthar rasa</i>	250 mg 2 tabs	BD after meal	1 month	Lukewarm water



**Figure 2.** Baldness before treatment.



**Figure 3.** Hairs after treatment.

culprits in this condition<sup>10</sup>. *C. rotandus* possesses antioxidant properties and rejuvenating properties. It is used in hair-related ailments for years in India<sup>11</sup>. *Pravalpanchamrit* is given for diseases related to calcium deficiency<sup>12</sup>. This formulation is rich in calcium. As the above discussion, if bone tissue is well metabolized then hairs can also be healthy.

According to *Ayurveda*, “*ya eva purishdhara sa eva asthidhara kala*” means the causative factors, signs and symptoms, treatment for bone-related diseases will be the same as the excretory system<sup>13</sup>. According to this concept, *Krumikuthar rasa* is given in this case. In case report of Satish Oshtawal, *krumikuthar rasa* is given in the case of Alopecia areata<sup>14</sup>. For external application oil massage is advised on a daily basis. Microneedling is a minor parasurgical procedure<sup>15</sup>. Micro-needling is done on the affected area of the scalp and Cupping was done as *Pitta* and *Rakta* are interrelated with each other and they are the important factors during pathogenesis. Cupping can be compared with *Alabu* which is described in bloodletting *Ayurveda*<sup>16</sup>. In the Article of G. N. Sree Dipthi, *Ayurvedic* management of Alopecia areata with surgical procedure *Kuttanam* (pricking needles) and internal medications: A case report, it is stated that *kuttanam* is a minor surgical procedure which is done on regular interval for hair gain<sup>17</sup>. In a report consisting of five cases by Izarul Hasan, wet cupping was found to be effective, similar to *Alabu* (cupping)<sup>18</sup>. Montgomery S. N. *et al.*, in their therapeutic practices, stated that wet cupping is the same as *Hijama* done in *Unani* stream<sup>19</sup>. AB Shah *et al.*, in their study stated that blood-letting is effective in cases of Alopecia areata<sup>20</sup>. The relapse rate of Alopecia areata is high as stated in the current treatment of alopecia areata. In Journal of Investigative Dermatology Symposium Proceedings by Shapiro J<sup>21</sup>. This relapse rate can be tackled with *Rasayan Churna* which acts as an antioxidant and is the best rejuvenator stated by AM Deshpande in his Role of *Rasayan Churna* in the outbreak of COVID-19 as a preventive and curative aspect<sup>22</sup>.

## 4. Conclusion

Alopecia areata can be completely treated with *Ayurveda*. The relation of *Dosha*, *Dhatu*, and *mala* should be taken into consideration while treating Alopecia areata. The drugs such as *Asthimajja*

*pachakvati*, *Pravalpanchamrit*, *Krumikuthar rasa* can be given internally along with bloodletting with cupping therapy for bloodletting. In adherence with this treatment, the patient was advised to apply hair oil on a daily basis. With the simple drug combination of *Ayurveda*, Alopecia areata can be treated successfully. *Viddhakarma* is a cost-effective invasive technique with remarkable results.

## 4.1 Patient's Perspective

The patient was very happy with his look and he was satisfied.

## 4.2 Consent

Informed consent was taken from the patient before doing microneedling and cupping.

## 4.3 Data Availability

*Underlying data\**

All data underlying the results are available as part of the article and no additional source data are required.

## 5. References

1. Rewdkar-Kole VM, Pawar VY. Management of indralupta (Alopecia areata) with the application of apamarg kshar and Jalaukavacharan - A case report. World Journal of Pharmaceutical Research. 2021; 10(6):998-1004.
2. Kirti D, Kumar HM. Charakokta Nimbadi Yoga in the management of Mansapradoshaj Vyadhi- A Review. National Journal of Research in Ayurved Science. 2019; 7(7):1-10. <https://doi.org/10.52482/ayurlog.v7i07.446>
3. Badyal M, Malhotra V. Indralupta and its management in *Ayurveda*. International Ayurvedic Medical Journal. 2022; 7(1):3328-32. <https://doi.org/10.46607/iamj12p6022022>
4. Pratt CH, King LE Jr, Messenger AG, Christiano AM, Sundberg JP. Alopecia areata. Nat Rev Dis Primers. 2017; 3:17011. <https://doi.org/10.1038/nrdp.2017.11>
5. Shapiro J. Current treatment of alopecia areata. J Invest Dermatol Symp Proc. 2013; 16(1):S42-4. <https://doi.org/10.1038/jidsymp.2013.14>
6. Bernardis E, Castelo-Soccio L. Quantifying Alopecia areata via texture analysis to automate the SALT Score Computation. J Invest Dermatol Symp Proc. 2018; 19(1):S34-S40. Erratum in: J Invest Dermatol. 2021; 141(4):947. PMID: 29273104. <https://doi.org/10.1016/j.jisp.2017.10.010>
7. Thakre TI, Fagne MS, Jyothy KB. Management of Indralupta (Alopecia areata) through *Ayurveda*-A case study. J Res Tradit Med. 2022; 3(6):172-9.

8. Jain S, Anita S. Elixir action of *Ayurveda* in khalitya. *Ayushdhara*. 2016; 3(2):639-45.
9. Sinha K, Mishra NP, Singh J, Khanuja SP. *Tinospora cordifolia* (Guduchi), a reservoir plant for therapeutic applications: A Review. *Indian Journal of Traditional Knowledge*. 2004; 3(3):257-70.
10. Bhat PM, Umale H, Lahankar M. Amalaki: A review on functional and pharmacological properties. *Journal of Pharmacognosy and Phytochemistry*. 2019; 8(3):4378-82.
11. Kamala A, Middha SK, Karigar CS. Plants in traditional medicine with special reference to *Cyperus rotundus* L.: A review. *Biotech*. 2018; 8(7):309. Epub 2018 Jul 9. PMID: 30002998; PMCID: PMC6037646. <https://doi.org/10.1007/s13205-018-1328-6>
12. Mallick A. Ayurvedic drugs from marine originates. *International Journal Pharmaceutical Research and Development*. 2013; 5(1):11-20.
13. Wasu IP, Choudhari V, Balwani R. Conceptual study of purishdhara kala in relation to asthidhara kala w.r.t. Ca<sup>+</sup>-Na<sup>+</sup> ion channels. *International Ayurvedic Medical Journal*. 2020; 8(4):3289-92.
14. Ostwal A. Management of indralupta (alopecia areata) with *Ayurveda* medicines and leech therapy – A case report. *Ayurpub Com*. 2022; 7(1):2002-5.
15. Gogate RB. *ViddhaaniAgnikarmachikitsa*. 4<sup>th</sup> Ed. Vaidyamitra publications. 2019; 24.
16. Pandey AK, Krishna A. Review of brihatyadi lepa and raktamokshana by ghata yantra (cupping therapy) in khalitya. *World Journal of Pharmaceutical Research*. 2021; 10(10):632-8.
17. Deepthi GN, Kumar CB, Kumar VK, Surendran ES, Sudhakar D, Raj RV. Ayurvedic management of Alopecia areata (Indralupta) with surgical procedure Kuttanam and internal medications: A case report. *J Ayurveda Case Rep*. 2021; 4:105-10. [https://doi.org/10.4103/jacr.jacr\\_5\\_21](https://doi.org/10.4103/jacr.jacr_5_21)
18. Hasan I. Cupping therapy for hair loss treatment: a report of five cases. *Research Journal of Medicinal Plants in Ayurveda*. 2021; 1(2):42-9. <https://doi.org/10.1155/2021/6659943>
19. Montgomery SN, Elbuluk N. *Therapeutic Practices. In Cultural Practices and Dermatoses*. Cham: Springer International Publishing. 2021; 1-29. [https://doi.org/10.1007/978-3-030-68992-6\\_1](https://doi.org/10.1007/978-3-030-68992-6_1)
20. Shah AB, Mohod P. Indralupta (alopecia areata): A case successfully treated with jalukavcharana (leech Therapy). *International Journal of Ayurveda and Pharma Research*. 2019; 7(1):10-2.
21. Shapiro J. Current treatment of alopecia areata. *J Investig Dermatol Symp Proc*. 2013; 16(1):S42-4. PMID: 24326551. <https://doi.org/10.1038/jidsymp.2013.14>
22. Deshpande AM, Deshpande MA. Role of Rasayanchurna in the outbreak of COVID-19 as preventive and curative aspect. *Int J Res Pharm Sci*. 2020; 11(SPL1):1208-12. <https://doi.org/10.26452/ijrps.v11iSPL1.3594>