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Case Study

Management Of Ardhavbhedaka W.S.R To Migraine Through Panchakarma: A Case Study

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ABSTRACT

Background:

Migraine is a primary headache disorder. Migraine is common neurovascular disease characterized by periodic commonly throbbing, intense headache in one half of the head, majority of times in the temporal region with some associated symptoms like nausea, vomiting, vertigo, photophobia etc. Case: A 22 years old female patient presented with symptoms of pain in left side of head, associated with photophobia, phonophobia etc. Treatment Protocol: Acharya's explained that all the Panchakarma procedures are indicated for Ardhavbhedaka. However, Nasya karma plays a vital role in disintegrating the pathology of the disease. The total duration of the treatment was done for 28 days followed by a gap of one week and follow-up was done for one month. Assessment Criteria: Improvement was assessed based on relief in the symptoms, MIDAS and VAS Score. Complete relief in all symptoms was noted after completion of the treatment. Any complications or adverse events due to treatment were not observed during the treatment period. This case report demonstrates the effectiveness of Nasya Karma in managing Ardhavbhedaka (Migraine).

INTRODUCTION

“Shirah” is the Pradhana Marma among 107 marmas[1]. It is considered as “Uttamanga” among all the Angas of the Sharira and it is the Ashraya of the Prana and all Indriyas[2]. Ardhavbhedaka Roga is one among the Shirorogas mentioned in Ayurvedic texts[3]. The word Ardhavbhedaka comprises of two components viz. Ardha and Avbhedaka. Ardha means half or half

side, Ava suggests bad prognosis and Bhedaka means breaking, perforating or bursting out type of pain[4]. Acharya Chakrapani, the commentator of Charaka Samhita had clarified the term Ardhavbhedaka by saying “Ardha Mastaka Vedana”[5]. The Doshas involvement in the Ardhavbhedaka are as follows; According to Acharya Charaka and Madhava, it is Vata-Kaphaja disease[6]. According to Acharya

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Sushruta, it is Tridoshaja disease[7]. According to Acharya Vagbhata, it is Vataja disease[8]. According to Acharya Vagbhata, pain in half side of head is considered as Ardhabhedaka[9]. Migraine is common neurovascular disease[10] characterized by periodic commonly throbbing, intense headache in one half of the head, majority of times in the temporal region with some associated symptoms like nausea, vomiting, vertigo, photophobia etc. Migraine is a primary headache disorder[11]. It most often begins at puberty and affects the age group between 16-45 years. It is more common in women, usually by a factor of about 2:1, because of hormonal influences[12].

MATERIAL AND METHODS

The patients were selected and registered for case study after their fulfillment of diagnostic criteria of Ardhabhedaka (Migraine). The literary method is selected from Different Ayurvedic Literatures like Sushruta Samhita, Charak Samhita, Ashtang Sangrah evam Astang Hridaya, Ayurvedic journals and internet. The drug is prepared in the pharmacy of DSRRAU, Jodhpur.

CASE REPORT: Patient Information

A female patient of age 22 year diagnosed with Ardhabhedaka (Migraine) On the basis of CRF Presented in Out Patient Department (OPD) of PG Department of Panchkarma, University Hospital of Ayurved, Dr. Sarvepalli Radhakrishnan Rajasthan Ayurved University, Jodhpur, Rajasthan, India (OPD Registration Number-9707) with complaints of pain in left side of head with pain interval less than 3-5 days. Associated Symptoms are mild phonophobia, photophobia, nausea etc. The onset of disease was started before 2 years. The symptoms were initially mild, but their severity increased gradually. Patient took allopathy treatment i.e NSAID's, tryptomer for 6 months without consultation with a physician but did not get relief. Taking details about his daily VAS score:

routine, patient has irregular sleeping pattern and dietary habits.

On Examination; General Examination

BP	110/74 mm Hg
PR	86/ minute
RR	15/ minute
Temp	35.8°C

Personal History:

Appetite- Normal and vegetarian

Micturition- 5-6 times/day, Normal

Sleep- Sound sometimes disturbed due to Pain

Bowel- Constipation

Asthavidha Pariksha

Nadi	Vata-Kaphaj & 86/minute, regular	Shabda	Spashta(Clear)
Mala	Prakrit	Sparsha	Samsheetoshna
Mutra	Prakrit	Drika	Prakrit
Jivha	Mala aavrit	Aakriti	Samanya

Weight- 44.5 Kg

CNS- Patients is conscious, well oriented to time, place and person.

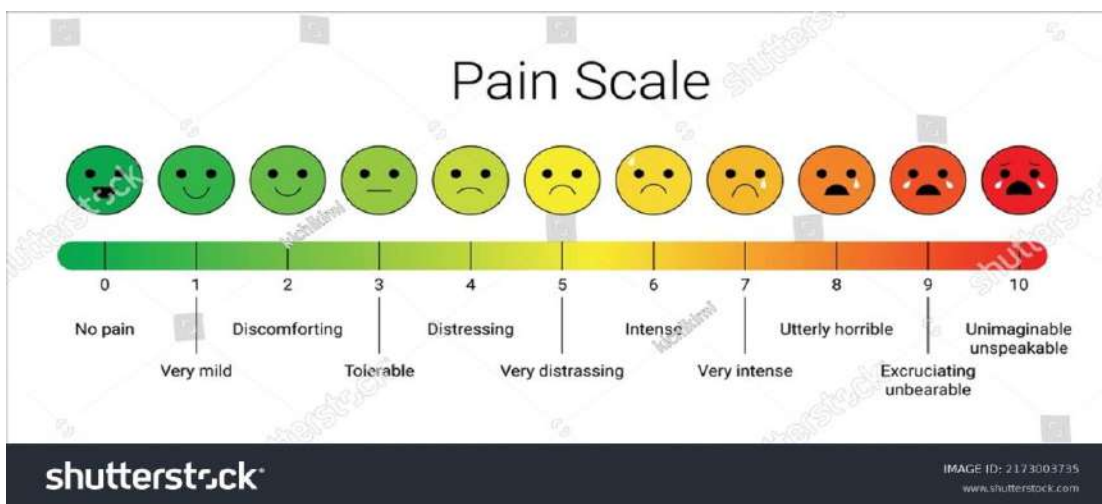
No relevant History of Past illness contributing to the current condition of the Patient.

No History of Diabetes Mellitus or Hypertension.

Family: All are said to be healthy in the family.

Diagnostic Assessment

Assessment of the Therapy was carried out before treatment and after treatment. It was done on the basis of various scales i.e. VAS Score, MIDAS and Subjective Parameter.



Subjective Parameters:

Based on symptoms of disease-

- Intensity of Headache
- Painless interval
- Duration of Headache (hours/ days)
- Nausea
- Vomiting
- Photophobia
- Phonophobia
- Vertigo

- Visual Disturbance

MIDAS (Migraine Disability Assessment Test):-

Questionnaire was put together to help you measure the impact your headaches have on your life. The information on this questionnaire is also helpful for your primary care provider to determine the level of pain and disability caused by your headaches and to find the best treatment for you.

The Migraine Disability Assessment Test

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INSTRUCTIONS

Please answer the following questions about ALL of the headaches you have had over the last 3 months. Select your answer in the box next to each question. Select zero if you did not have the activity in the last 3 months. Please take the completed form to your healthcare professional.

1. On how many days in the last 3 months did you miss work or school because of your headaches?
2. How many days in the last 3 months was your productivity at work or school reduced by half or more because of your headaches? (Do not include days you counted in question 1 where you missed work or school.)
3. On how many days in the last 3 months did you not do household work (such as housework, home repairs and maintenance, shopping, caring for children and relatives) because of your headaches?
4. How many days in the last 3 months was your productivity in household work reduced by half or more because of your headaches? (Do not include days you counted in question 3 where you did not do household work.)
5. On how many days in the last 3 months did you miss family, social or leisure activities because of your headaches?

Total (Questions 1-5)

What your Physician will need to know about your headache:

- A. On how many days in the last 3 months did you have a headache? (If a headache lasted more than 1 day, count each day.)
- B. On a scale of 0 - 10, on average how painful were these headaches? (where 0=no pain at all, and 10=pain as bad as it can be.)

Scoring: After you have filled out this questionnaire, add the total number of days from questions 1-5 (ignore A and B).

MIDAS Grade	Definition	MIDAS Score
I	Little or No Disability	0-5
II	Mild Disability	6-10
III	Moderate Disability	11-20
IV	Severe Disability	21+

If Your MIDAS Score is 6 or more, please discuss this with your doctor.

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Therapeutic Intervention

According to predominance of Dosha Dushya and as per treatment mentioned in Ayurvedic Texts for Ardhavbhedaka, Nasya karma is selected for management. The total duration of the treatment

was done for 28 days followed by a gap of one week and follow-up was done for one month. Advises related to Pathya-Apathya (wholesome-unwholesome diet) were given during the treatment and follow-up period.

Table 1: Panchakarma Procedure timeline

Duration	Details of Procedure
28 Days :- 2 sittings (26 Nov 2022 – 23 Dec 2022)	Facial Abhyanga and Swedana simultaneously. After that Nasya Karma. <ul style="list-style-type: none"> • Facial Abhyanga with Tila taila. • Nasya Karma with Gunja taila. Dose- 4 Bindu

Method of Nasya Karma (Errine Therapy):

It is carried out in three steps- Poorva karma, Pradhana Karma and Pashchat Karma.

A. Poorva karma

Abhayanga (massage): Then advice the patient to lie down on Nasya table. Mridu Abhyanga should be done on scalp, forehead, face, and neck for 5-10 minutes by medicated oil.

Swedana (sudation): According to Ayurvedic classics Swedana should not be given to the head. Mridu swedana should be given for elimination of Doshas and liquifaction of Doshas. Panitapa Sweda (fomented by warm palm) should be given on scalp, forehead, face, and neck.

B. Pradhana Karma

The patient should be lie down in supine position with ease on Nasya table. Head should be Pralambita. Head should not be excessively flexed or extended. After covering the eyes with cotton cloth, the physician should raise the tip of the patients's nose with his left thumb, and with the right hand, lukewarm medicine should be dropped in both the nostrils one by one. The physician should observe appropriate Samyak Nasya Karma (signs of proper errine therapy).

C. Pashchat Karma

After Samyaka lakshana, Dhoompana and Gandusha (Gargles) were administered. Patient was advised to take some rest and vitals were noted. Patient should stay at Nivata Sthana (place devoid of wind). Laghuaaahara (light meal) and Sukhoshna Jala (luke warm water) is advised. Patient should avoid himself from Ashtamahadoshkara bhava.

FOLLOW-UP AND OUTCOMES

Follow-up was taken for one month on a fortnight basis, during which clinical assessment was done based on the improvement of the patient's symptoms. No complications, new symptoms, or adverse events were observed during the entire treatment and follow-up period.

RESULTS

VAS score was 8 at the time of procedure starting, 4 during the procedure and 2 after compleation of the procedure. Also there is improvement in the sign and symptoms, MIDAS Score.

Table no. 2 VAS Score before and after treatment with follow up

VAS SCORE	Before treatment	After treatment			
		1st Follow Up After 07 days	2nd Follow Up After 14 Days	3rd Follow Up After 21 Days	4 th Follow Up After 28 Days
Pain	7	7	5	4	1

Table no.3 MIDAS Score before and after treatment with follow up

MIDAS Score	Before treatment	After treatment			
		1st Follow Up After 07 days	2nd Follow Up After 14 Days	3rd Follow Up After 21 Days	4 th Follow Up After 28 Days
Total Score	32	28	20	12	6

Table no.4 Subjective Parameters before and after treatment with follow up

Subjective Parameters	Before treatment	After treatment			
		1st Follow Up After 07 days	2nd Follow Up After 14 Days	3rd Follow Up After 21 Days	4 th Follow Up After 28 Days
Intensity of Headache	2	2	0	0	0
Painless interval	3	0	0	0	0
Duration of Headache	2	1	0	0	0
Nausea	1	0	0	0	0
Vomiting	0	0	0	0	0
Photophobia	3	3	2	1	1
Phonophobia	1	0	0	0	0
Vertigo	0	0	0	0	0

DISCUSSION

Nasya is one of Bio-purificatory measures; the procedure involves the administration of medicines through the nasal route. Medicines administered through the nasal route directly deliver the medicine to the brain, thereby disseminating it to the entire body[13]. On administration, the potency of the herbs used for nasal instillation reach shringataka (the vital point at the base of the nose), and then the potency spreads to the head, eyes, ear, and throat, and aids in expelling the morbid Doshas (vitiated humour) from the head. The probable mode of action may be imputed to its stimulating effect on the brain through olfactory and respiratory pathways. The nasal epithelium is a highly permeable monolayer, and the submucosa also has extensive vasculature; it promotes rapid absorption and direct entry of the drug into the systemic circulation, bypassing hepatic metabolism. Intranasal drug delivery via

olfactory and respiratory pathways is a promising option to deliver medication to the central nervous system. Lipid-based drugs of lower molecular weight less than 400–600 Da (Dalton), with a positive charge, have a better capacity to cross the blood-brain barrier[14]. All Shirorogas (head disorders) primarily arise due to the aggravation of Tridosha, with Vata or Vata-Kapha predominating. Therefore, effective management of Ardhavbhedaka involves the use of medications possessing Ushna and Snigdha qualities, with a focus on Vatahara (alleviating Vata) or Vata-Kaphahara (alleviating both Vata and Kapha) properties. Hence, Gunja Taila was appropriate drug for migraine due to its contents and properties i.e Components of Gunja Taila[15] - Tila taila (Sesame oil), Bhringraj (Eclipta alba), Kanji and Gunja (Abrus precatorius). Maximum contents of this oil have Madhura - Katu - Tikta - Kashaya rasa, Laghu, Ruksha guna, Ushna veerya, Katu

Vipaka and Kapha- Vata Shamaka property. Gunja Taila Shirovirechana Nasya (eliminating nasal instillation), Nasya was administered after following pre and post-therapeutic measures as per treatise. Significant improvements with delayed response were noticed in the Intensity of headache, nausea/vomiting, photophobia, phonophobia, vertigo or visual disturbance.

CONCLUSION

The available contemporary treatment have drawbacks like – drug dependence, medication withdrawal syndrome, headache recurrence within hours, and chances of developing chronic headache. It is poorly managed, that leads to high and unrecognized impact on quality of life. In Ayurveda; Panchkarma procedure Nasya Karma and proper Pathya-apthya effectively treat Ardhavbhedaka (Migraine). Further research with a large enough sample size and detailed research methodologies is required to verify and substantiate the role of Ayurveda interventions in treating Ardhavbhedaka (Migraine).

REFERENCES

1. Agneevesha, Charaka Samhita with Ayurveda Dipika Sanskrita Commentary by Chakrapani, Revised by Acharya Charaka & Dradhabala, Chaukhambha Publication, New Delhi, Reprint 2014, Siddhi Sthana chap. 9/3, page – 1050.
2. Agneevesha, Charaka Samhita with Ayurveda Dipika Sanskrita Commentary by Chakrapani, Revised by Acharya Charaka & Dradhabala, Chaukhambha Publication, New Delhi, Reprint 2014, Sutra Sthana chap. 17/13, page – 332.
3. Sushruta, Sushruta Samhita with the Nibandh sangraha sanskrita commentary by Dalhan acharya, Chaukhambha Surbharti Publication, Varanasi, 2014, Uttar tantra chap. 25/ 3-4 page – 645
4. Sushruta, Sushruta Samhita with the Nibandh sangraha sanskrita commentary by Dalhan acharya, Chaukhambha Surbharti Publication, Varanasi, 2014, Uttar tantra chap. 56/6 page – 781
5. Agneevesha, Charaka Samhita with Ayurveda Dipika Sanskrita Commentary by Chakrapani, Revised by Acharya Charaka & Dradhabala, Chaukhambha Publication, New Delhi, Reprint 2014, Sutra Sthana chap. 17/16, page – 333.
6. Sushruta, Sushruta Samhita with the Nibandh sangraha sanskrita commentary by Dalhan acharya, Chaukhambha Surbharti Publication, Varanasi, 2014, Uttar tantra chap. 25/ 15 page – 655
7. Agneevesha, Charaka Samhita with Ayurveda Dipika Sanskrita Commentary by Chakrapani, Revised by Acharya Charaka & Dradhabala, Chaukhambha Publication, New Delhi, Reprint 2014, Siddhi Sthana chap. 9 / 75, page – 721
8. Vagbhatta, Ashtang Hridayam with Nirmala hindi commentary by Dr. Brahmanand Tripathi, Chaukhambha Sanskrit Pratishthan, Delhi, Reprint 2011, Uttar Sthan chap. 23 / 7, page – 1051
9. Vagbhatta, Ashtang Hridayam with Nirmala hindi commentary by Dr. Brahmanand Tripathi, Chaukhambha Sanskrit Pratishthan, Delhi, Reprint 2011, Uttar Sthan chap. 23 / 8, page – 1051
10. Goadsby PJ, Raskin NH. Chapter 15 Headache. In: Fauci AS, Braunwald E, Kasper DL, Hauser SL, Longo DL, Jameson JL, et al., editors. Harrison's principles of internal medicine. 17th ed. New York: The McGraw-Hill Companies; 2008.
11. Cephalalgia, International Headache Society 2013, Reprints And Permissions: Sagepub.Co.Uk/Journals Permissions. Nav DOI: 10.1177/0333102413485658, Cep.Sagepub.Com



12. Stovner Letal. The global burden of headache: a documentation of headache prevalence and disability worldwide. *Cephalalgia*. 2007; 27: 193 – 210.
13. Vd. Paradkar HS, A, Vagbhata. *Ashtang Hridaya, Sarvangasundara commentary*. Vol. Sutra Sthana; Nasya vidhi Adhyaya 20/5. Varanasi: Chowkhamba Krishnadas Academy; 2006.
14. Singh SK, Swami P, Rajoria K. Effects of medicated enema and nasal drops using Triphaladi oil in the management of obesity-A pilot study. *J Ayurveda Integr Med*. 2020;11:173–6.
15. Bhaisajya Ratnavali, Prof. Siddhinandan Mishra, Shiroroga Chikitsa, Chapter no. 52, Verse no. 55; Choukhmbha Surbharti Publication, 2016;728

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