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# STUDY OF EFFICACY OF BODHIVRUKSHA KASHAYA IN VATASHONITA WITH SPECIAL REFERENCE TO VATASHONITA CHIKITSA SIDDHANT ACCORDING TO CHARAK SAMHITA

Dr. Sonam P. Karande\*<sup>1</sup>, Dr. Rajesh V. Sawai<sup>2</sup>, Dr. Milind V. Rampurkar<sup>3</sup>, Dr. Santosh T. Jatale<sup>4</sup> and Dr. Dipali U. Suke<sup>5</sup>

<sup>1,5</sup>PG Scholar, Department of Samhita, Government Ayurved College, Nanded.

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\*Corresponding Author Dr. Sonam P. Karande

PG Scholar, Department of Samhita, Government Ayurved College, Nanded.

#### **ABSTRACT**

Ayurveda is an eternal science of life. It deals with healthy as well as ailing individuals. The health of an individual depends solely on his/her diet and lifestyle. Lifestyle has changed, with that dietary habit of our society has also being changed which is getting more under influence of modernization and western civilization. But due to modernization not only lifestyle but also the dietary habits has hampered a lot. Introduction of junk foods, Chinese food, burger, pizza etc. has started disturbing the healthy environment of our society due to which people are suffering from diabetes, hypertension, heart attacks, young ones with infertility, PCOD in female, obesity and

many more life threatening diseases are seen commonly now a days. One of such lifestyle disorder is Vatarakta, which is common condition among the acute as well as the chronic inflammatory joint disorders. The painful, swollen and stiff joints in Vatarakta lead to disability or crippling in the patients. It is a debilitating disease with respect to its chronicity and complications, causing hurdle in our day to day life. Due to this crippling nature, Vatarakta poses a great challenge to physicians in the world. Ayurvedic texts provide a great insight etiopathology, symptomatology and treatment of Vatarakta. The present study the effect of Bodhivruksha Kashaya with Madhu on 30 patients was analyzed properly. After this study it was concluded that Bodhivruksha Kashaya with madhu was effective in relieving symptoms in patients of Vatarakta.

<sup>&</sup>lt;sup>2</sup>Professor, Department of Samhita, Government Ayurved College, Nanded.

<sup>&</sup>lt;sup>3,4</sup>Asst. Professor, Department of Samhita, Government Ayurved College, Nanded.

**KEYWORDS:** Vatashonita, Bodhivruksha Kashaya, Vatashonita Chikitsa Siddhant.

#### INTRODUCTION

Modern era is all about new advances and technology.... Day today life style is changing faster as modern techniques are developing and the luxury of lifestyle is also advancing. This lifestyle with modern instruments and techniques had made life very easy and with least efforts, each and everything can be made easily available as per one's necessity, due to which our lifestyle had become effortless and individuals are getting prone to various diseases related to lifestyle. These diseases are now known as lifestyle disorders.

One of such lifestyle disorder is Vatarakta. The dietary habits like fast food, spicy, oily and heavy diet, rukshahara, viruddhashana, vishamashana, along with jalkrida, jagrana, diwaswapa, atyadhwagamana, veganigraha have been described as 'hetus' of Vatarakta. Specific hetu stated in our texts i.e.hasti-ashwaoshtra agatya which means riding over elephant, horses and camels as in old times these were the main locomotor service which can be correlated to now a day with riding bike-vehicles, where both the legs are in hanging posture. [1] These mainly vitiate Vata and Rakta. As the name of disease suggests, the Vyadhikarta Dosh – Vata and the Dushya – Rakta are equally responsible for the Samprapti. The Dushit Rakta causes Margavarodha and the Dushti of vata in such condition creates Shotha, Toda, Stambha and Sparshaasahtva in the Parva Sandhi. The symptoms of Vatarakta could be correlated with symptoms of 'Gout' described by the modern medicine. Gout is systemic skeletal disorder having the defects of Purine metabolism characterized by recurrent paroxysmal attack of acute inflammatory arthritis usually affecting a single peripheral joint which may further cause chronic degenerative changes in affected joint. While considering the treatment of this disease, modern system of medicine is easily accessible to the patients all over the world and is good in reducing pain and stiffness of the joints. The use of allopathic medicine shows not only side effect and toxic symptoms, but also serious complications like organic lesions such as kidney failure, liver damage etc. Despite the gastrointestinal side effects and cardiovascular risk, NSAIDs and corticosteroids are the drugs of choice in Gout. Interaction with anticoagulant, fluid retention and loss of renal function are other adverse effects which discourage its use even further. But this usually shows Hyperglycemia, Osteoporosis and fluid retention on longer usage. The side effects of both the drugs need to be emphasized a little more in case of Gout, as majority of the patients of Gout are middle aged or elderly and these age group is generally more prone to Hypertension,

Diabetes mellitus and comorbid renal or cardiovascular diseases. Thus the need for safe and effective therapeutic approach becomes highlighted.<sup>[2]</sup>

Ayurveda which is ancient and holistic medical science had mentioned that the improper lifestyle and diet is root cause of all diseases. Is capable of providing a safe and effective line of treatment for Vatarakta. The texts are rich with variety of formulations. Vatarakta Chikitsa is explained according to different stages (avastha) in Charak Samhita. Sanshodhana and Samshamana these two Chikitsa are mentioned.<sup>[3]</sup> When Tridoshaj Darun Vatarakta vyadhi develops Bodhivruksha Kashaya and Madhu sevan is suggested. Intake of this Yog helps fast (Aashu) recovery of Tridoshaj Darun Vatarakta (gambhir dhadugat avastha).<sup>[4]</sup>

Vatarakta having Samprapti independently of Rakta and according to Ashraya Ashrayi Bhava pitta is Raktashrayi hence Dushti of pitta is directly correlated to the Dushti of Rakta. <sup>[3]</sup> Therefore we can use Bodhivruksha Kashaya effectively in Vatarakta. So after looking over all conditions of 21<sup>st</sup> century the diet, lifestyle, jobs etc we can come to conclusion that Vaatrakta is an emerging health issue, so to enlighten the importance of its severity, the treatment and hazard of allopathic NSAIDs, I have selected this topic to study in detail about Vatarakta.

In my study, 30 patients of Vatarakta are taken form Govt. Ayurvedic hospital. Criteria for selection of patient are Sandhishotha, Sandhitoda, Sparshaasahatva and Serum uric acid level. Bodhivruksha Kashaya 80ml with 5gm of Madu was given to patient orally in divided doses at morning and evening for 30 days and effects on the symptoms such as Toda (pain), Shotha (Swelling), Sparshaasahatva (Tenderness) and Serum Uric Acid Level were evaluated.

In this study, Randomized Prospective clinical trial was conducted. Bodhivruksha Kashaya with Madhu was given to the patients of Vatarakta and effects on subjective and objective parameters were analysed. After this study it was concluded that Bodhivruksha Kashaya with madhu was effective in relieving symptoms in patients of Vatarakta.

#### AIM AND OBJECTIVES

# Aim

To evaluate the efficacy of Bodhivruksha Kashaya in Vatashonita with special reference to Vatashonita Chikitsa Siddhant according to Charak Samhita.

# **Objectives**

- 1. To study in detail about Vata Shonita Chikitsa Siddhant.
- 2. To study in detail about Vata Shonita.
- 3. To assess the efficacy of Bobhivruksha Kashaya in Vata Shonita.
- 4. To study whether any change occurs in the levels of Serum Uric Acid.

#### MATERIAL AND METHODS

In this study, total 30 patients were randomly selected.

#### Type of Study

Literary with simple open randomized prospective clinical trial

# **Material of Study**

- 1. Review of Literature regarding Vatashonita.
- 2. Diagnosed Patients of Vatashonit from OPD and IPD of Govt. Ayurvedic College and Hospital.
- 3. Bodhivruksh valkal bharad

Madhu

#### **Methods**

- 1. Collection of literature from Brihatrayee was done.
- 2. In the clinical study, patients of Vatarakta attending the O.P.D. and I.P.D. of Ayurvedic Hospital were selected for the present study irrespective of their sex, religion, occupation etc. between the age group 20-60 years.
- 3. A Detailed history was taken and a special research proforma was prepared for the study incorporating all the relevant points from both Ayurvedic and Modern views.
- 4. A written informed consent of each patient is obtained before starting the treatment.

# **Criteria of Assessment**

#### 1. Objective criteria

Serum uric acid (Normal range = 1.5 - 8.0mg/dl)

# 2. Subjective Criteria

Table 1: Sandhi Toda (joint pain).

Sr. No.	Observations	Grade
1	No pain	0
2	No difficulty in movement but mild pain	1
3	Difficulty in movement with moderate pain	2
4	Inability in movement with severe pain	3

Table 2: Sandhi Shotha (joint swelling).

Sr. No.	Observations	Grade
1	No swelling	0
2	Swelling obvious on one or two joints	1
3	Swelling obvious on more than two joints	2

Table 3: Sparshasahatva (Tenderness).

Sr. No.	Observations	Grade
1	No tenderness	0
2	Tenderness on pressure	1
3	Tenderness on slight touch	2

Table 4: Over All Assessment.

Sr. No.	Observations	Result
1	No Response	0% change
2	Mild Response	< 20% improvement
3	Moderate Response	20 – 50% improvement
4	Marked	> 50% improvement

# Drug

Bodhivruksha kashaya with Madhu.

# A. Preparation of the Kashay

Bodhivruksha kashaya was prepared according to Sharangdhar Samhita:<sup>[5]</sup>

- 20 gm of Bodhivruksha Valkal Bharad (Yavakuta) is taken for Kashaya preparation
- Its 16<sup>th</sup> times i.e. 320ml of water was added to it.
- Water was allowed to evaporate slowly until it was reduced to 1/fourth Then heating was stopped and filtered through clean cotton cloth.
- The filtered obtained is Bodhivruksha Kashaya.
- Every time kwath was prepared from the same raw material source.
- Kashaya was freshly prepared daily in the morning and evening.

- The bodhivruksha Kashaya Dravyas was provided to patient and explained the procedure preparation of Kashaya to take it at home in decided dose and advised to consult if any adverse effects occur.
- For this study I have taken self-collected Bodhivruksha valkal (Twak), Bharad was prepaired and standerdisation of drug was done.
- Before providing the Valkal Bharad of Bodhivruksha Kashaya to patient, Kashaya was
  prepared with aforementioned method and send to laboratory for phytochemical analysis
  and quality assurance and after reporting it was used for study.

# **B.** Drug Administration

Bodhivruksha kashaya 80ml with 5gm of Madhu was given to patient orally in divided doses

- At Morning- Bodhivruksha Kashaya (40ml) + Madhu (2.5gm)
- At evening- Bodhivruksha Kashaya (40ml) + Madhu (2.5gm)

The drug was given to the patient before meal (after complete digestion of previous meal)

StudyDesign

Simple open randomized prospective clinical trial



Screenig of patient's for inclusion



Assessment of textual Nidan Panchak in patients



Single group comprising 30 patients showing lakshanas of Vatashonita Was selected for clinical trial



Bodhivruksha kashaya 80 ml with 5gm of madhu was given orally in two

Devided doses before meal for 30 days



Follow up on 1<sup>st</sup>, 7<sup>th</sup>, 14<sup>th</sup>, & 30<sup>th</sup> day.



Assessment Before and After treatment



Statistical Analysis



Discussion and Conclusion

#### **OBSERVATION AND RESULTS**

In the present study, 30 individuals were registered. The clinical study was completed with 30 patients. All the patients were examined before and after the treatment. No adverse effects were observed during the entire procedure. All collected data is presented in tabular form.

# • Subjective Criteria Observation

Table 5: frequency distribution of patients according to Sandhitoda.

Sadhitoda	1st day	7th day	14th day	30th day
Grade 0	0	1	4	15
%	0.0	3.3	13.3	50.0
Grade 1	3	8	19	15
%	10.0	26.7	63.3	50.0
Grade 2	11	15	7	0
%	36.7	50.0	23.3	0.0
Grade 3	16	6	0	0
%	53.3	20.0	0.0	0.0
Total	30	30	30	30
%	100.0	100.0	100.0	100.0

Before treatment, maximum patients were of grade -3 i.e. 16(53.3%), 11(36.7%) patients were of grade-2 and 3(10%) patients were of grade-1.

Out of 30 patients, 2 (6.7%) patients have got 25%-50% Toda (Pricking sensation) relief followed by 13 (43.3%) patients have got 50%-75% Toda (Priking sensation) relief. Percentage of total Toda (Pricking sensation) relief is 15 (50%).

Table 6: Frequency distribution of patients according to Sandhishotha.

Sandhishotha	1st day	7 <sup>th</sup> day	14 <sup>th</sup> day	30 <sup>th</sup> day
Grade 0	0	1	15	24
%	0.0	3.3	50.0	80.0
Grade 1	10	21	15	6
%	33.3	70.0	50.0	20.0
Grade 2	20	8	0	0
%	66.7	26.7	0.0	0.0
Grade 3	0	0	0	0
%	0.0	0.0	0.0	0.0
Total	30	30	30	30
%	100.0	100.0	100.0	100.0

Before treatment, maximam patients were of grade -2 i.e. 20(66.7%) followed by 10(33.3%) patients of grade-1.

Out of 30 patients, 6 (20%) patients were of range 25%-50% Shotha (Swelling) relief and percentate of total relief in Shotha (Swelling) is 24 (80%)

Table 7: Frequency distribution of patients according

Sparshaasahatva	1st	7th	14th	30 <sup>th</sup>
Grade 0	0	1	14	23
%	0.0	3.3	46.7	76.7
Grade 1	12	23	16	7
%	40.0	76.7	53.3	23.3
Grade 2	18	6	0	0
%	60.0	20.0	0.0	0.0
Grade 3	0	0	0	0
%	0.0	0.0	0.0	0.0
Total	30	30	30	30
%	100.0	100.0	100.0	100.0

# to Sparshaasahatva.

Before treatment, maximum patients were of grade -2 i.e. 18(60%) followed by 12(40%) patients of grade-1.

Out of 30 patients, 7 (23.3%) patients were of range 25%-50% Sparshaasahatva (Tenderness) relief and Percentage of total Sparshaasahatva (Tenderness) relief is 23 (76.7%).

# **OBJECTIVE CRITERIA OBSERVATION**

Table No.8: Frequency distribution of patients according to Serum Uric Acid Level

Serum Uric Acid Level	B.T.		A.T.	
Serum Offic Acid Level	Frequency	Percent	Frequency	Percent
Below 1.5 mg/dl	0	0.0	0	0.0
1.5 - 8.0 mg/dl	29	96.7	30	100.0
Above 8.0 mg/dl	1	3.3	0	0.0
Total	30	100	30	100

Before treatment maximum patients were of range 1.5- 8.0mg/dl i.e. 29(96.7%) followed by 1(3.3%) patients of range above 8.0 mg/dl.

### **Statistical Analyasis**

The present study the effect of Bodhivruksha Kashaya with Madhu on 30 patients was analyzed properly.

Scores of symptoms in 30 patients separately were analyzed by comparing before treatment (day 0) with after 7 days, 15 days and with after treatment (30 days) by using Friedman's Test (i.e. Non Parametric Test).

Serum uric acids in 30 patients were analyzed before treatment and after treatment by using Wilcoxon Signed Ranks Test. P-value summary is expressed as follows-

P>0.05 - Not significant

P<0.05 - Significant

P<0.01 - Markedly significant

P<0.001 - Highly significant

# Results of statistical analysis

In present study the effect of Bodhivruksha kashaya with Madhu on 30 patients of Vatarakta were analysed properly. The grades are reduced after the treatment significantly for all factors (Toda, Shotha, Sparshaasahatva and Serum uric acid level)

**Table 9: Showing Overall Effect of Therapy.** 

Effect	No. of patients	% of improvement
No Response	0	0 %
Mild Response	0	0%
Moderate Response	0	0 %
Marked Response	30	100 %

Above table shows that, in these study 30 patients 100% patients showed marked improvement.

#### RESULTS AND DISCUSSION

Siddhant was the result of many practical works, examined by many Acharya. Hence they are fruitful in chikitsa, these are not merely a drug and disease relation but this is a clue for chikitsa. With the help of siddhant we can do perfect clinical work.<sup>[6]</sup>

Hence for clinical assessment I choose Vatarakta Chikitsa Siddhant and seen the result of Bodhivruksha Kashaya in Tridoshaj Darun Vatashonita.

A total 30 diagnosed patients of Vatarakta were registered from OPD and IPD of Ayurveda Hospital for the study. The signs and symptoms of Vatarakta as per Samhitas. And Gout was mainly considered for the diagnosis. Routine physical examination along with Serum uric acid level was done for each patient.

A definite change in the disease state of patients was observed during the study. Improvement noted was measured by using the standard methods of scoring for subjective and objective criteria. The stages of inflammatory disorders assessed before and after. Serum uric acid level was also studied before and after the treatment to judge the change occurred due to the intervention.

#### **Serum Uric Acid Level**

In my study I have mentioned in my inclusive criteria that will be taking all patients of vatarakta with raised serum uric acid level. But during my studies of vatarakta patients I found only 1 patient with raised serum uric acid level (as per given in modern text for defining gout) and all other 29 patients were having with (1.5-8.0mg/dl) serum uric acid levels but other criteria for vatarakta were present.

1. The values of serum uric acid levels were statistically analyzed showing significant result in all 30 patients.after administration Bodhivruksha Kashaya with Madhu in given proposed doses has lowered the levels of serum uric acid.

Mode of Action of Adminsterd Drug.

This result shows that Bodhivruksha Kashaya with Madhu combination is effective in treating the complaints of Sandhi Toda (pain), Sandhi Shotha (Swelling) and Sparshasahatva (Tenderness) in patients suffering from Vatarakta. The mode of action of Bodhivruksha Kashaya and Madhu presented as follows:

- 2. Bodhivruksha kashaya 80ml with 5gm of Madhu was given to all patient orally in divided doses
- At Morning Bodhivruksha Kashaya (40ml) + Madhu (2.5gm)
- At evening Bodhivruksha Kashaya (40ml) + Madhu (2.5gm)

The drug was given to the patient before meal (after complete digestion of previous meal) for 30 days.

- 3. Bodhivruksha Kashaya with Madhu Yoga described in Vtarakta Chikitsa Siddhant gives results in tridoshaja Vatarakta.
- 4. After the treatment Sandhi Shotha, Sandhi Toda and Sparshaasahatva lakshanas also decreased and as per modern aspects serum uric acid level also decreased in patients.
- 5. When the Margavarodh of vayu by Kapha and Meda vruddhi, in such a state Bodhivruksha Kashaya with Madhu is indicated in the text.
- 6. Bodhivruksha Karmukatva<sup>[7]</sup>
- 1. Bodhivruksha have Kashaya and Madhura Rasa
- 2. Sheet Virya

So it decreases Raktashrit Pitta Tikshnta.

3. Guru guna

Decreases Laghutva Results in Vatashamana.

- 4. Because of its Ruksha guna and Katu Vipaka it helps to decrease Kapha and Meda.
- Madhu Karmukatva<sup>[8]</sup>
   it has
- 1. Kashaya and Madhura Rasa
- 2. Sheet Virya

So it is results in Raktashrit Pitta Shamana.

- 3. Madhu has Ruksha guna and Katu Vipaki which helps to decrease Kapha and Meda by Kapha-Meda Chedan and Lekhan Karma.
- 4. Madhu has termed as Yogavahi by its Prabhava so drug acts more effectively.
- 8. Hence, the Shaman of Dushit Rakta reduces the Dushit Pitta Dosha and Vata Dosha and the link between the Dosha Dushya sammurchana be dislodged. Thereby, the symptoms like Sandhi Toda, Sandhi Shotha, and Sparshasahtva are relieved.
- 9. Where, Sandhi Toda and Sparshasahatva both symptoms are Vata pradhan therefore when Margavrodh is removed by Ruksha Guna and Katu Vipaka of the Bodhvruksha Kashaya and Madhu Avyahat Gati of Vaat is maintained and lakshanas are relieved.
- 10. The symptom Sandhi Shotha is due to Dushit Rakta Dhatu. The Bodhvruksha Kashaya and Madhu possess Pitta shamaka property; hence Sandhi Shotha will be relieved instantaneously.

According to Results obtained on Sandhi Toda, Sandhi Shotha, Sparshasahatva and serum uric acid level effectively decreased and statistically significant.

#### CONCLUSION

Vatashonita (Joint disorders) has been considered as a major problem to the physicians since long. Vatashonita is mentioned in the literature since Pauranika kala. Oral Intake of Bodhivruksha Kashaya helps in recovery of Tridoshaj Darun Vatarakta and reducing Sandhi Toda (pain), Sandhi Shotha (swelling), and Sparshasahatva (tenderness), of the affected joints in Vatarakta. Serum Uric acid levels were reduced in all patients due to oral intake of Bodhivruksha Kashaya. Thus it can be concluded that Bodhivruksha Kashaya as given orally was utilized into metabolism that had intervened into significance of lowering Serum uric acid levels. From the clinical study carried out it can be concluded that, Bodhivruksha Kashaya with Madhu was effective, simple, cheap and safe for the patients having Vatashonita.

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