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CLINICAL EVALUATION OF EFFECT OF BHARANGYADI AVALEHA AND VAMANA THERAPY IN THE MANAGEMENT OF TAMAK SHWASA

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ABSTRACT

In the Current Study 30 Patients of Tamaka Shwasa have been selected randomly divided in two groups. The patients showing classical symptoms of Tamaka Shwasa such as Shwasakruchhrata (Dyspnoea), Kasa (Cough), Ghur-Ghurak Shabda (Wheezing or Rhonchi) During night, Kasten Shleshma Moksha (Difficult in Expectoration), Kasten Bhashya (Difficult in speech) etc. were included in this study. For the present study we were given Vamana Therapy followed by Bharangyadi Avleha orally in one group i.e group A. In control group B modern medication was given. In group A expansion of chest, Breath Holding Time and Peak Expiratory Flow Rate was increases significantly. In group A none patients showed total Relief in symptoms, 7 patients were markedly improved, 2 patients were unchanged. In group B none patients showed total relief in symptoms. 3 patients were markedly improved. 26 were improved, 1 patient was unchanged. At the end of the study it was found that Vamana Therapy followed by Bharangyadi Avleha is more effective than modern medication.

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KEY WORDS: Tamaka Shwasa, Bharangyadi Avaleha, Bronchial Asthma, Vamana therapy

INTRODUCTION

"Science of Life" known as "Ayurveda". In the literature of Ayurveda there are various chapters, which deal with behavioral & dietary changes according to diurnal changes. It suggests if one follows these rules we can lead to healthy life for longer period. Shwasa Propounded by Lord Atreya in Charka Samhita.[1] It is a disease of Pranvaha Srotasa. Shwasa arises due to dust, smoke, wind residing in cold place using cold water physical exertion, intake of rough food, irregular meals,

vitiation of *Ama*. Bronchial Asthma has 4 to 5 % of the population in United States is affected. Data from the Centers of Disease control and prevention suggest that 10 to 11 million persons had acute attack in 1998, which resulted in 13.9 million outpatient visits, 2 million request for urgent care, and 423,000 hospitalization which are total >\$6 billion.[2] Nearly 5 to 10% population suffer from it. In India prevalence of asthma has been found to be around 6%. [3] This disease can start at any age, but in a majority it starts before 10 years of age. It is twice

more common amongst boys than girls, whereas in adults the male – female ratio is usually equal. This alarming raise in the prevalence of Tamaka Shwasa can be accounted to factors such as Atmospheric pollution, rapid environmental changes, adaptation of newer dietetic preparations and tremendous psychological stress.

AIM AND OBJECTIVES

- To assess clinically the efficacy of "BHARANGYADI AVALEHA" in the management of Tamaka Shwasa.
- To assess clinically the efficacy of Vamana karma in the management of Tamaka Shwasa.
- To assess clinically the efficacy of Shodhana poorvaka Shamana chikitsa in the management of Tamaka Shwasa.

METHODS AND MATERIALS

- Group A: 30 Patients were treated with shodhana poorvaka Shamana chikitsa i. e. vamana therapy f/b bharangyadi avleha orally. Dose: - 5 gm Twice a Day, after meal for 15 days
- Group B: 30 Patients were treated with "Tab.Deriphyllin"
- Dose: 100 mg Thrice a day.

Design:

 A randomized, open label, controlled clinical trial will be conducted on diagnosed patients.

Inclusion Criteria:-

Age - 16 to 60 years

Sex - Both male & female

- Newly onset uncomplicated Bronchial Asthma
- Mild & Moderate Bronchial Asthma
- Samtamaka Shwasa

Exclusion Criteria:-

Patients having following criteria:

- Bronchial Carcinoma
- Emphysema
- Chronic Pulmonary Obstructive Disease
- Pleural Effusion
- Tuberculosis
- Status Asthmatics
- Cardiac Asthma

Objective Criteria:

X-Ray chest PA view to rule out other respiratory disease

Peak Flow Meter for lung capacity Spirometry for vital capacity of lung ESR

Eosinophil Count

Preparation of Drug:

Avaleha Kalpana was selected for present study on the basis of references of Acharya Charaka. These are specific indications of Leha Kalpana given by Acharya. In present study Avaleha Kalpana has been prepared as Gudavaleha. For this purpose especially Purana Guda was used. According to opinion of Bhavaprakasha new Guda increases Kapha & Shvasa both, while Purana Guda is explained as Laghu Pathya, Balya, Vataghna, Agnivriddhikar & Rakta Prasadaka property

CONTENTS OF BHARANGYADI AVALEHA

Bharangi (Mula): 1 part
Haritaki (Fruit) : 1 part
Dashmool (Mula): 1 part

Trijat : 1/20 part (Prakshepa)

Guda : Half of total kwath dravya

Sr. no	Name	Rasa	virya	Vipaka	Guna	Doshaghnata
1	Bharangi	Katu Tikta Kashaya	Ushna	Katu	Ruksha Ushna Laghu	Kaphavatashamaka
2	Haritaki	Kashaya, Katu, Tikta, Madhur, Amla	Ushna	Madhura	Ruksha Laghu Anulomana	Tridosha shamaka Specially Vatanulomana
3	Dashmool	Madhura, katu	ushna	Madhur	Vata kaphashamaka	Vata kaphashamaka
4	Trijat	Katu, tikta	ushna	Katu	Vata shamaka, deepana	Vata shamaka, deepana
5	Guda	Madhura	shita	Madhura	Balya	Balya

Vamana Therapy:

(a) Deepana Pachana

All the patients are given *trikatu choorana* for *deepana pachana* for three days sometimes more than three days is required for *Agni deepana*. After this *Abhyantra Snehapana* is given.

(b) Abhyantra Sneh pana

Go gritha is administered daily in the morning in vardhamana Krama (increasing dose) starting from 30 ml. or as per the kostha. Patient is daily examined and assessed for Samayaka Sneha Jirna Lakshana. Sneha is given till the Samayaka Snigdha lakshana are obtained. During this period patient is advised to take only luke warm water. Food is given only when the patient feels very hungry. He is not allowed to sleep in the day. He must live as a brahmachary and sleeps at night.

(c) Vamana

Samayak Snigdha lakshana is followed with three days abhyanga purva swedana. Before giving the vamana aushadha on 4 th day, whole body Abhyanga swedana is done. After this patient made to sit towards east direction and the effect of karma is explained. Then the medicine is given after reciting the mantra. All the vitals like B.P., Pulse, and

Respiration rate are noted. These vitals are also recorded during the complete process of vamana karma. Careful observation is done for assessing the vamana vega. At last, the patient is assessed for type of *shudhi*, *Hina*, *Madhyama*, *uttama* and it is followed by *sansarjana krama*.

SANSARJAN KRAMA

On completion of the *vamana karma*, the type of *shudhi* assessment is done on three parameters *Laingiki, Vaigiki, and Antiki* as told by the patient and observed by us. Then according to *shudhi, sansarjana krama* is advised for 3, 5 and 7 days.

After following the *sansarjana krama*, the *shamana chikitsa* is prescribed to the patient. Bharangyadi Avaleha 10 gms twice in a day given with *ushnodaka* as an *anupana*. During the follow up period no medicine is given.

GROUP B

In this group 30 patients were given modern medication. Tab Deriphylline 100 mg thrice in a day, for 2 months with 15 days interval.

Table 1 Showing effect of therapy on physical parameter of 30 patients of *Tamaka Shwasa* in Group A

Physical parameter	Mean	Mean	% of relief	SD	SE	t value	p value
	BT	AT					
Respiratory rate	22.86	18.56	18.80	2.03	0.37	8.62	< 0.05
Expansion of chest	83.86	85.06	1.43	0.69	0.12	13.83	< 0.05
Breath Holding Time	10.53	12.2	15.82	0.76	0.14	11.14	< 0.05
Peak ExpiratoryFlow	165.33	195.66	18.34	11.08	2.02	16.5	< 0.05
rate							
Sustained Maximal	3.7	5.8	53.98	0.45	0.08	25.37	< 0.05
Inspiration							

Table 2 Showing effect of therapy on physical parameter of 30 patient of *Tamaka Shwasa* in Group B

Physical parameter	Mean	Mean	% of relief	SD	SE	t value	p value
	BT	AT					
Respiratory rate	22.9	19.43	15.15	2.02	0.38	9.4	< 0.05
Expansion of chest	83.86	84.86	1.19	0.52	0.09	11.77	< 0.05
Breath Holding Time	10.43	11.83	13.09	0.62	0.11	9.6	< 0.05
Peak ExpiratoryFlow	170.66	192.66	12.89	10.38	1.89	12.16	< 0.05
rate							
Sustained Maximal	14.3	5.66	40.44	0.49	0.09	17.77	< 0.05
Inspiration							

Effect of Vamana Therapy and Bharangyadi Avaleha (Group-A) & Tab.Deriphylline (Group-B) on physical Parameters

Respiration rate:-

Group A: The mean grade score of Respiratory rate was 22.86 at the start of the treatment which was reduced to 18.56 at the end of treatment its 't' value is 12.14 (P<0.05%) which is statistically significant.

Group B: The mean grade score of Respiratory rate was 22.9 at the start of the treatment which was reduced to 19.43 at the end of treatment its 't' value is 13.20 (P<0.05%) which is statistically significant.

Expansion of chest:-

Group A: The mean grade score of Expansion of chest was 83.86 at the start of the treatment which was increase to 85.06 at the end of treatment its 't' value is 9.2 (P<0.05%) which is statistically significant.

Group B: The mean grade score of Expansion of chest was 83.86 at the start of the treatment which was increase to 84.86 at the end of treatment it's' value is 9.2 (P<0.05%) which is statistically significant.

Breath Holding Time:-

Group A:The mean grade score of Breath holding time was 10.53 at the start of the treatment which was

increased to 12.20 at the end of treatment its 't' value is 10.37 (P<0.05%) which is statistically significant.

Group B: The mean grade score of Breath holding time was 10.46 at the start of the treatment which was increased to 11.83 at the end of treatment its 't' value is 1.80 (P<0.05%) which is statistically significant.

Peak Expiratory Flow Rate:-

Group A: The mean grade score of Peak Expiratory flow rate was 165.33 at the start of the treatment which was increased to 195.66 at the end of treatment its 't' value is 14.16 (P<0.05%) which is statistically significant.

Group B: The mean grade score of Peak Expiratory flow rate was 170.66 at the start of the treatment which was increased to 192.66 at the end of treatment its 't' value is 38.96 (P<0.05%) which is statistically significant.

Sustained Maximal Inspiration:-

Group A: The mean grade score of Sustained maximal inspiration was 3.7 at the start of the treatment which was increased to 5.8 at the end of treatment its 't' value is 4.61 (P<0.05%) which is statistically significant.

Group B: The mean grade score of Sustained maximal inspiration was 14.03 at the start of the treatment which was increased to 40.44 at the end of treatment its't' value is 4.6 (P<0.05%) which is statistically significant.

Table 3 Statistical analysis of symptoms of patient of *Tamaka Shwasa* Wilcoxon

Symptoms	Sum of ranks of BT	Sum of ranks of AT	No of pairs	Z	Comment (Critical value of z at 5% level of significance=1.96)
Shwasakrucchrata	52	20	30	12.76	Highly significant
Kasa	49	17	30	12.80	Highly significant
Ghur –Ghur Shabda	63	27	30	12.59	Highly significant
Kasten shleshma moksha	55	20	30	12.71	Highly significant
Krucchren Bhashyatsa	46	18	30	12.84	Highly significant
Anidra	41	16	30	12.92	Highly significant

Table 4: Statistical analysis of symptoms of patient of *Tamaka Shwasa* Wilcoxon

Symptoms	Sum of ranks of BT	Sum of ranks of AT	No of pairs	Z	Comment (Critical value of z at 5% level of significance=1.96)
Shwasakrucchrata	53	22	30	12.74	< 0.05 Highly significant
Kasa	52	23	30	12.76	< 0.05 Highly significant
Ghur -Ghur Shabda	55	21	30	12.49	< 0.05 Highly significant
Kasten shleshma moksha	60	21	30	12.64	< 0.05 Highly significant
Krucchren Bhashyatsa	52	24	30	12.53	< 0.05 Highly significant
Anidra	48	21	30	12.59	< 0.05 Highly significant

Shwasakricchata:-

Group A: It was observed in 30 patients of Group A i.e. 100% there was 61.53% relief observed after treatment. At the end of treatment its 'Z' value is 12.76 (P<0.05%) which is statistically significant.

Group B: It was observed in 30 patients of Group A i.e. 100% there was 58.49% relief observed after Treatment. At the end of treatment its 'Z' value is 12.74 (P<0.05%) which is statistically significant.

Kasa:-

Group A: It was observed in 30 patients i.e. 100% there was 65.30% relief observed after treatment. At the end of treatment its 'Z' value is 12.80 (P<0.05%) which is statistically significant.

Group B: It was observed in 30 patients i.e. 100% there was 55.76 % relief observed after treatment. At the end of treatment its 'Z' value is 12.76 (P<0.05%) which is statistically significant.

Ghur-Ghurakshabda:-

Group A: It was observed in 30 patients i.e. 100% there was 57.14% relief observed after treatment. At the end of treatment its 'Z' value is 12.59 (P<0.05%) which is statistically significant.

Group B: It was observed in 30 patients i.e. 100% there was 61.81% relief observed after treatment. At the end of treatment its 'Z' value is 12.49 (P<0.05%) which is statistically significant.

Kastenshlesma moksa:

Group A: It was observed in 30 patients i.e. 100% there was 63.63% relief observed after treatment.At the end of treatment its 'Z' value is 12.71 (P<0.05%) which is statistically significant.

Group B: It was observed in 30 patients i.e. 100% there was 65.00% relief observed after treatment. At the end of treatment its 'Z' value is 12.64 (P<0.05%) which is statistically significant.

Krcchren Bhashya:-

Group A: It was observed in 30 patients i.e.100% there was 60.86% relief observed after treatment. At the end of treatment its 'Z' value is 12.84 (P<0.05%) which is statistically significant.

Group B: It was observed in 30 patients i.e. 100% there was 60.97% relief observed after treatment. At the end of treatment its 'Z' value is 12.92(P<0.05%) which is statistically significant.

Anidra:

Group A: It was observed in 30 patients i.e. 100% there was 53.84% relief observed after treatment. At the end of treatment its 'Z' value is 12.53 (P<0.05%) which is statistically significant.

Group B: It was observed in 30 patients i.e. 100% there was 56.25% relief observed after treatment. At the end of treatment its 'Z' value is 12.59 (P<0.05%) which is statistically significant

DISCUSSION

None of the patients had got complete remission in both groups. In the group A, 54.55% attained marked improvement. In the group B 15.38% attained marked improvement. There was moderate improvement in the status of 27.27% patients of the group B and 53.84% patients of the group A. There was mild improvement in the status of 18.18% of the group B and 27.27%, of the group A. 2 patients remained unchanged in the group A, while the status remained unchanged in 7.69% patients of group B. No side effects were observed from the drug during the present study in both groups.

Comparison of the effects

When the percentage of relief was compared, in Swasakrchrata, Pinasa, Urahsula, Parsvasula and Kaphasteevan, Group A showed moderately better results than group B. This data ascertain the importance of Sodhana purva Samana in relieving the cardinal symptoms in Tamakaswasa. As far as the associated symptoms are concerned, Asino labhate saukhyam, Krchrat bhasitam, Kantodhvamsana, Slesma vimoksante sukham and Anidra are remarkably reduced in the group A than group B.

MODE OF ACTION

The probable mode of action of the drug can be discerned from the results.

Vamana: The Snehana and Svedana prior to the Vamana, liquify the abnoxious Ama and bring the Dosas to the Kostha. The embeded kapha in the Pranavaha Srotas is also brought to the Amasaya. The suceeding Vamana, expel the Dosas accumulated at the kostha. Urdhvamasaya is considered to be the location for Kapha and through Vamana, Kapha accumulated is eliminated. Therefore by Vamana, the Dosas accumulated at the root itself is eliminated. The elimination of the Kapha is evident from the highly significant results obtained in the symptoms of Kasa, Ghurghuraka, Pinasa and Slesma vimoksante sukha.

Bharangyadi Avaleha

The Samana yoga in swasa is expected to provide Deepana and Pacana activity as well as Balya effects on Pranavaha srotas. The results obtained in this clinical trial reveals the Shaman therapy followed by Shodhan therapy is more effective.

CONCLUSION:

The optimum results has been seen by the usage of drugs which improve the consistency of Srotas and Agni and Bharangyadi Avaleha is such a drug.

Sodhana purva Bharangyadi Avaleha in chronic Tamaka Swasa is the better option in relieving the symptoms as well as prolonging the recurrence by augmenting the Balam.

REFERENCES

- Agnivesha. Charak Samhita, Hindi Commentary by Acharya Vidyadhar Shukla, Prof. Ravidutta Tripathi, 21st ed. Chikitsa Sthana chapter 17 verse 1, Varanasi: Choukhamba Sanskrit Pratisthan; 1995 p. 416
- 2. Principles of Internal Medicine Harrisons by J.L. Jamson, 15th ed. Chapter 254, Vol 2; 2005 p. 1508.

- 3. API text book of Medicine by G. S. Sainani, 9th ed. Respiratory Diseases section, Chapter 5; 2003 p.291
- Agnivesha. Charak Samhita, Hindi Commentary by Achrya Vidyadhar Shukla, Prof. Ravidutta Tripathi, 21th ed. Chikitsa Sthan chapter 17 verse 55-62, Varanasi: Choukhamba Sanskrit Pratisthan; 1995 p. 424
- Bhaishjya Ratnavali by Kaviraj Ambikadutta Shashtri, editor Rajeshwardatta Shashtri, 11th ed. Chapter 16 verse 20, Varanasi: Chaukhmba Sanskrit Sansthan; 1993. p.332