

**Impact
Factor
3.025**

ISSN 2349-638x

Refereed And Indexed Journal

**AAYUSHI
INTERNATIONAL
INTERDISCIPLINARY
RESEARCH JOURNAL
(AIIRJ)**

Monthly Publish Journal

VOL-IV

ISSUE-II

FEB.

2017

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Effect of Balchaturbhadra churna in Tamaka shwas (Bronchial Asthma) in Children

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Abstract-

Asthma has been recognized as one of the world's major health problem. There is no cure for Asthma as per the Conventional Medical Science. The management line is mainly based on Short-acting β_2 -agonists, the ophylline, oral and inhaled Glucocorticosteroids etc., all of which cause significant side effects in the long run. In many parts of the world, "alternative" or "traditional" therapies have been reported to be of use in the treatment of asthma. The most widely used therapies are acupuncture, homeopathy, herbal medicine, and Ayurvedic medicine (which include transcendental meditation, herbs, and yoga). However the use of these therapies in asthma has not been validated by controlled clinical trials and their mechanisms of action are not clearly understood. The potential side effects of long-term use of inhaled glucocorticosteroids in both children and adults need to continue to be monitored. The risk of side effects from inhaled glucocorticosteroids needs to be examined in malnourished children.

Many Ayurvedic research works have been reported till date in various specialties on the disease Tamaka Shwasa. Many of them have attempted new formulations in the palliative management. While childhood and adult asthma share the same underlying path physiological mechanisms, because of the processes of growth and development, the effects, and adverse effects of asthma and asthma treatments in children differ from those in adults.

This retrospective research on the efficacy of Balchaturbhadra Churna on Tamak Shwas is planned as an open placebo controlled Clinical trial understanding the pharma co dynamics of the yoga in the selected experimental models.

Introduction:

The medical science is growing in all dimensions to achieve health and longevity of human being. The pioneer of all Medical systems, Ayurveda is based on its profound theories on the structural and functional aspects of wellness and illness. Vedas being the coffers of the entire ancient Indian Wisdom provide the first ever documented data on diseases and medicines. Approximately 300 million people around the globe suffer from asthma and this number is rising. Worldwide, deaths from this condition have reached over 1,80,000 annually. In Western Europe as a whole, asthma has doubled in ten years, according to the UCB Institute of Allergy in Belgium. In the United States, the number of asthmatics has leapt by over 60% since the early 1980s and deaths have doubled to 5,000 a year. In Australia, one child in six under the age of 16 is affected. Asthma is not just a public health problem for developed countries. In developing countries, however, the incidence of the disease varies greatly. India has an estimated 15-20 million asthmatics. Rough estimates indicate a prevalence of between 10% and 15% in 5-11 year old children.

Materials and Methods:

- **Method of Preparation :**

Formulation composition:

- | | | | |
|----------|---|----------------------|--------|
| 1. Musta | - | Cyperus rotundus Rt. | 1 Part |
|----------|---|----------------------|--------|

- | | | | |
|------------------|---|----------------------------|--------|
| 2. Pippali | - | Piper longum Fr. | 1Part |
| 3. Ativisha | - | Aconitum heterophyllum Rt. | 1 Part |
| 4. Karkatshringi | - | Rhus succedania Gl. | 1 Part |

- ✓ After thorough cleaning and drying in the shade each drug was finely powdered individually and passed through sieve number 85.
- ✓ Equal quantity of all four fine powdered ingredients was mixed together after weighing.
- ✓ Then passed through sieve number 44 to obtain a homogeneous blend.
- ✓ The drug is packed in tightly closed container to protect from light and moisture.
- ✓ The drug was mixed with honey just prior to intake.

• **Description of “Balachaturbhadra Churna”**

- ✓ The Churna is pale brown colour.
- ✓ The odour characteristic of Pippali and taste slightly pungent followed by a tingling sensation.

• **Dose:**

3gm/day in divided doses internally with madhu for 3 years old child, (and dose was increased by 1 gm/year respectively) schedule for a period for four weeks.

• **Anupan : Madhu**

• **Source Of Data :**

Total 60 patients were taken up for study from in our College Hospital, after subjecting to selection criteria based on inclusion and exclusion criteria. 30 patients were given Balchaturbhadra churna 3gm/day in divided doses internally with madhu for 3 years old child, (and dose was increased by 1 gm/year respectively) schedule for a period for four weeks. Remaining 30 patients were given syp. salbutamol 0.1-0.4mg/kg/dose every 8 hrs internally in a span of four weeks. Both the groups were subject for a Subjective parameters (dyspnoea, cough, common cold) and Objective parameters (clinical examination, blood investigation) following a standard proforma.

Observation and Result:

Total effect of Drugs for both groups-

Data showing Total effects of Drugs for both groups over 30 patients-

Effect	Group A Control Group	Group B Trail Group	Total
Marked improvement.	30	30	60
Moderate improvement.	00	00	00
Mild improvement.	00	00	00
No improvement.	00	00	00

Group A

Overall effect over group A showed 30 patients were shown marked improvement.

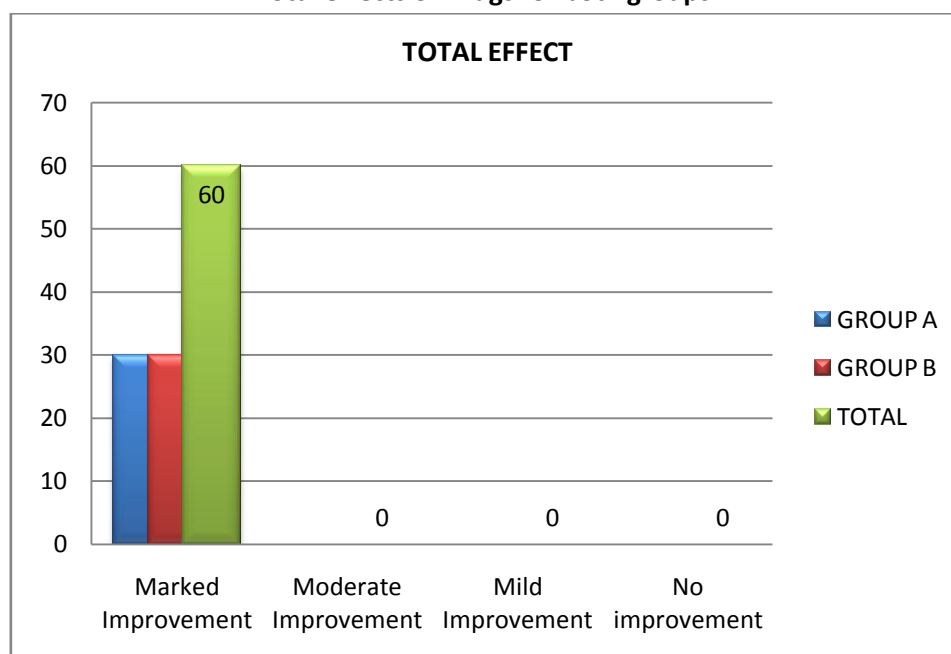
Group B

Overall over group B showed 30 patients were shown marked improvement.

TOTAL

Overall effect over 60 patients was shown marked improvement.

Total effects of Drugs for both groups.



Discussion:

Plan of study

In this study, total 60 patients of Tamak shwasa were selected and treated into two groups:-

- Group-A:-** 30 patients of this group were treated with Balchatubhadra churna in dose of 3 gm per day in divided dose with madhu for maximum up to one month in Vegavastha for orally.
- Group-B:-** 30 patients of this group were treated with Syp. Salbutamol in dose of 0.1-0.4mg/kg every 8 hrs for maximum upto one month in Vegavastha for orally.

The scoring was given to the signs and symptoms, based upon the severity of symptoms. The assessment was carried out before treatment and after treatment to evaluate the effects of therapy. The results obtained in this study are as follows:-

It was observed that maximum number of patients in the present study was in the age group of 5-6yrs (30%) in Group A and then in age group of 5-6 Yrs. (33.33%) in Group B, On the basis of table no.1 this clearly indicates that the children in between the age of 4-5 yrs are more prone to disease. The highest incidence in this age group may be due to more exposed to allergens such as dust, air pollution.

Sex wise distribution of patients reveals that the highest number of patients were male i.e. 63% followed by female 36% in Group A, while as in Group B male 56% followed by female 43%. The male: female ratio suggests that male were more susceptible to the disease.

In this study, on the basis of observation, 86.66% and 76.66% patients were term birth while as 13.33% and 23.33% patients were preterm birth in Group A and Group B respectively. There is no specific role of marital status in development of tamaka Shwasa.

Analysis based on socio-economic status of the patients of present study, depicts incidence of vataj abhishyanda among lower class 5% and 80% followed by lower middle 30% and 66.66% classes of society in Group A and Group B respectively. One reason may be that lower and lower middle classes people remain exposing to dusty particles for the arrangement of bread and butter, which may be the causative factor for the formation of tamak shwasa.

The distribution of patients based on clinical features indicates that 99% patients complained of Shwas Kasthata (dyspnea), Kasa (cough), Kanthodhdhasanam (irritation in throat), Peenas (rhinorrhea) and Chest tightness, wheezing.

Overall effect of this study:

Considering the all above response of the patients in Group A and group B, there were all patients cured completely after completing treatment.

On the basis of above results it can be concluded that in both the Groups BALCHATURBHADRA CHURNA and SALBUTAMOL helps in *Tamaka Shwasa*, and provides significant relief in all its symptoms. From observation and Statistical analysis of these findings indicate that response to treatment was significant after comparing means of two Groups.

Conclusion:

- Tamaka Shwasa explained in Ayurveda classics is evidently a disease of Prana vaha srotas.
- The disease is classified prognostically as a *yapya roga*.
- Symptomatically the disease corresponds with Bronchial Asthma in modern parlance.
- There is no special reference regarding Childhood Asthma in Ayurvedic literature.
- The symptoms, aetiopathogenesis and management are hence will be in the same line as in adults.
- Classical management of Tamaka shwasa in texts focus on shodhana chikitsa, mainly virechana and vamana.
- Shodhana chikitsa is the last choice in children and hence the need of a good shamana drug for the management of Tamaka Shwasa in children.
- The samprapti of Tamaka Shwasa is mainly of two types. Vata purvaka and kapha purvaka.
- Ama has a key role to play in the initiation of Samprapti in Tamaka Shwasa.
- The hypothesis H_1 - Balchaturbhadra Churna is significantly effective in Tamak Shwasa is accepted at $P=0.0017$.

The end results showed that the "Balchatubhadra Churna" was an effective Ayurvedic treatment for the management of Tamaka Shwasa in reducing the clinical features.

However this study was a pilot study. The efficacy of this drug compound needs further exploration so that new vistas can be opened by further research.

References:

- i. Charaka Samhita of Agnivesa : Chaukhamba Prakashana : volume 2 : Reprint : 17th Adhyaya : Page No. 424.
- ii. Meharban Singh & Ashok Deorani : Drug Dosage in Children, Sagar Publications : 8th Edition- April 2011: Page No. 113.
- iii. Siddhinanda Mishra : Bhaishajya Ratnavali, Chaukhamba Prakashana : Reprint : Page No. 1081.
- iv. Madhava Nidana : Madhukosha vyakya with Vidyotini hindi Tika- Chaukhamba Sanskrit Sansthan.
- v. Mahajana B.K. : Methods in Bio-statistics, Jaypee Publication : 6th Edition 1997.