ABSTRACT

ShwetaPradara is one of the common complaints suffered by women mostly of reproductive age. The symptoms like Yonigatashwetasraava, Kandu, Dourgandhya would be so severe that the daily life of women will be affected. Though it is not mentioned as a separate disease in Brihattrayee, there are many formulations indicated for shwetasrava, picchilata, kandu, dourgandhya and kleda in Yoni. One such formulation is the administration of Aragvadadi kashaya in the form of Parisechana. 10 female subjects aged between 18-50 years, married were selected based on inclusion and exclusion criteria. Aragvadadi Kashaya Parisechana was administered for 7 days and pre and post assessment was done. The results were statistically significant in reducing the symptoms of ShwetaPradara.

Keywords: ShwetaPradara, Aragvadadi Kashaya, Kandu, Dourgandhya, Picchilata, Kleda.

INTRODUCTION: A woman is referred as moola for Apatya, since she has got the divine power to reproduce the offspring. But this power also comes with great miseries as there are many diseases women suffer in the reproductive age. Be it Artavavyapats, Yonivyapats or Asrugdara the reproductive life of women is put into miseries through various such diseases. One such common ailment is ShwetaPradara. This is often a symptom of any underlying disease. Shweta is white and Pradara means excessive flow. Excessive white discharge through the vagina constitutes ShwetaPradara which is the Pratyatmalakshana. It may get associated with Dourgandhya, Kandu, Picchilata and Kledatva in Yoni.

Leucorrhea is excessive normal vaginal discharge. Normal vaginal discharge is watery, white in color, non-odorous with pH around 4. Discharges occurring other than these characteristics are pathological with infective and non-infective causes. Involvement of infection can be clinically identified by pruritis, irritation and foul smell.

MATERIALS AND METHODS

SOURCE OF DATA - Subjects visiting OPD of Government Ayurveda Medical College and Hospital, Mysore, Government Hi-tech Panchakarma Hospital, Mysore were enrolled in the study.

RESEARCH DESIGN - It was an open clinical trial with pre and post treatment assessment.

INCLUSION CRITERIA - 10 subjects aged between 18-50 years, married, fulfilling the diagnostic criteria were enrolled in the study.

EXCLUSION CRITERIA - ShwetaPradara due to pathologic conditions like malignancy, prolapse uterus and other gynaecological diseases which interferes in the course of treatment.

- Pregnant women, women with IUCD, STD.

- Subjects suffering from TB, HBsAg, HIV & other systemic diseases.

DIAGNOSTIC CRITERIA
Subjects with complaint of Shweta Srava along with any of the symptoms such as - Kandu – Picchilata – Kleda – Dourgandhyata in yoni were included in the study.

**ASSESSMENT CRITERIA**: Assessment was done based on subjective criteria

**SUBJECTIVE CRITERIA**
- Kandu - Picchilata - Dourgandhya - Kleda

1. **YONI SRAVA** (amount)
   - 0: Absent
   - 1: Mild - no need to change under garments
   - 2: Moderate - need to change undergarment, no pad required.
   - 3: Severe - requires pad (frequently changes undergarment), severe irritation

2. **PICCHILATA** (Consistency of srava)
   - 0: Absent
   - 1: Present

3. **YONI KANDU**
   - 0: Absent
   - 1: Mild - without need to scratch
   - 2: Moderate (relief by scratching) 3: Severe (unrelieved by scratching)

4. **YONI DOURGANDHYA**
   - 0: Absent
   - 1: Present

5. **KLEDA**
   - 0: Absent
   - 1: Present

The change in the score was assessed before treatment, after treatment and also after follow up.

**DRUGS**: Aragvadha (Cassia fistula Linn.), Indrayava (Holarrhena antidysentrica Linn.), Patali (Stereospermum suaveolens DC), Kakatikta (Hydnocarpus laurifolia), Nimba (Azadirachta indica A. Juss), Amruta (Tinospora cardifolia), Madhurasa (Marsdenia tenacissima W&A), Sruvavruksha (Flacourtia ramontchi), Patha (Cissampelos pareira Linn), Bhuinamba (Andrographis paniculata), Sairyaka (Barleria prionitis Linn), Patola (Trichosanthes anguina), Karanjayugma (Pongamia pinnata), Caesalpinia bonduc cella Flem., Saptachada (Alstonia scholaris), Agni (Plumbago zeylanica Linn), Sushavi (Momordica charantia Linn), Phala (Randia dumetorum), Bana (Niligrianthus ciliates), Ghonta (Areca catechu Linn). These drugs were procured in the form of Stoolachoura. For parisechana 400 ml of Kashaya was prepared with these drugs by standard Kashaya preparation method.

**PARISECHAHA VIDHI**
It is carried out in 3 steps - Poorvavakarma, Pradhana Karma and Paschat karma.

**POORVA KARMA**
- Sterilizing the instruments.
- Preparation of Kashaya
- Subject was asked to empty bladder before undergoing the procedure.

**PRADHANA KARMA**
- 400 ml of Kashaya was filled in douche can and a rubber catheter was fixed.
- External genitalia was washed with the kashaya and slowly the catheter was inserted in and parisechana was done.

**PASCHAT KARMA**
- Subject was asked to cough to remove any residual kashaya from the vaginal canal.
- Subject was asked to rest for a minimum of 2 hours after procedure.
- Advice of abstinence and maintenance of hygiene was given.

**STATISTICAL DESIGN**
- Chi-square and Cramer’s V test were used to determine the significance in the study group.

**STATISTICAL ANALYSIS**
- Insignificant p<0.1
- Significant p<0.05 or p<0.01
Highly significant p<0.001

ETHICAL CLEARANCE

Ethical clearance was obtained for the study by institutional ethical committee. Consent was taken from every subject undergoing treatment in this study.

OBSERVATIONS

A total of 10 subjects who were suffering from ShwetaSrava along with Picchilata, Kandu, Dourgandhya and Kleda in Yoni were subjected for Parisechana.

Table No. 1 Showing Changes in the degree of ShwetaPradara before treatment, after treatment and after follow up.

<table>
<thead>
<tr>
<th>Sl. No</th>
<th>Grading</th>
<th>Before Treatment (0th day)</th>
<th>After treatment (8th day)</th>
<th>After follow up (15th day)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Absent</td>
<td>0</td>
<td>7(70%)</td>
<td>7(70%)</td>
</tr>
<tr>
<td>2</td>
<td>Mild</td>
<td>3(30%)</td>
<td>3(30%)</td>
<td>3(30%)</td>
</tr>
<tr>
<td>3</td>
<td>Moderate</td>
<td>5(50%)</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>4</td>
<td>Severe</td>
<td>2(20%)</td>
<td>0</td>
<td>0</td>
</tr>
</tbody>
</table>

Table No. 2 Showing Changes in the degree of Picchilata before treatment, after treatment and after follow up.

<table>
<thead>
<tr>
<th>Sl.No</th>
<th>Grading</th>
<th>Before Treatment</th>
<th>After Treatment</th>
<th>After follow up</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Absent</td>
<td>1(10%)</td>
<td>10(100%)</td>
<td>10(100%)</td>
</tr>
<tr>
<td>2</td>
<td>Present</td>
<td>9(90%)</td>
<td>0</td>
<td>0</td>
</tr>
</tbody>
</table>

Table No. 3 Showing Changes in the degree of Kandu before treatment, after treatment and after follow up.

<table>
<thead>
<tr>
<th>Sl. No</th>
<th>Grading</th>
<th>Before Treatment</th>
<th>After treatment</th>
<th>After follow up</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Absent</td>
<td>3(30%)</td>
<td>8(80%)</td>
<td>9(90%)</td>
</tr>
<tr>
<td>2</td>
<td>Mild</td>
<td>2(20%)</td>
<td>1(10%)</td>
<td>1(10%)</td>
</tr>
<tr>
<td>3</td>
<td>Moderate</td>
<td>2(20%)</td>
<td>1(10%)</td>
<td>0</td>
</tr>
<tr>
<td>4</td>
<td>Severe</td>
<td>3(30%)</td>
<td>0</td>
<td>0</td>
</tr>
</tbody>
</table>

Table No. 4 Showing Changes in the degree of Dourgandhya before treatment, after treatment and after follow up.

<table>
<thead>
<tr>
<th>Sl. No</th>
<th>Grading</th>
<th>Before treatment</th>
<th>After treatment</th>
<th>After follow up</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Absent</td>
<td>5(50%)</td>
<td>10(100%)</td>
<td>10(100%)</td>
</tr>
<tr>
<td>2</td>
<td>Present</td>
<td>5(50%)</td>
<td>0</td>
<td>0</td>
</tr>
</tbody>
</table>

Table No. 5 Showing Changes in the degree of Kleda before treatment, after treatment and after follow up.

<table>
<thead>
<tr>
<th>Sl. No</th>
<th>Grading</th>
<th>Before treatment</th>
<th>After treatment</th>
<th>After follow up</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Absent</td>
<td>2(20%)</td>
<td>9(90%)</td>
<td>9(90%)</td>
</tr>
<tr>
<td>2</td>
<td>Present</td>
<td>8(80%)</td>
<td>1(10%)</td>
<td>1(10%)</td>
</tr>
</tbody>
</table>

RESULTS: ShwetaSrava was seen in mild degree in 3(30%) of the subjects and moderate degree in 5(50%) subjects and severe in 2(20%) subjects before treatment which was reduced to 7(70%) subjects with absence of ShwetaSrava and 3(30%) subjects with mild degree of Srava after treatment.

After follow up also 7(70%) subjects had absence of Srava with 3(30%) having mild degree of Srava.
The result was statistically highly significant with p value 0.001 and Cramer’s V value 0.593. Picchilata was present in 9(90%) subjects before treatment which was reduced to 0(0%) subjects having Picchilata after treatment and after follow up. The result was highly significant with p value 0.001 and Cramer’s V value 0.770. Kandu was seen at mild grade in 2(20%) subjects with moderate degree in 2(20%) subjects and severe degree in 3(30%) subjects which was reduced to 8(80%) subjects with absence of Kandu and 1(10%) subject with mild degree of Kandu after treatment. After followup 9(90%) subjects had absence of kandu and 1(10%) had mild degree of Kandu. The result was highly significant with p value 0.001 and Cramer’s V value 0.499. Dourgandhya was present in 5(50%) subjects before treatment which was reduced to 0(0%) subjects having Dourgandhya after treatment and after follow up. The result was statistically significant with p value 0.001 and Cramer’s V value 0.555. Kleda was present in 8(80%) subjects before treatment which was reduced to 1(10%) with kleda after treatment and also after follow up. The result was statistically significant with p value 0.001 and Cramer’s V value 0.800. **DISCUSSION:** Shweta Pradara is a Kapha pradhana tridoshajavyadhi affecting Artavavahasrotas. In brihattrayee there are many antahparimarjana and bahiparimarjana chikitsa mentioned for the cure of shwetarsrava, kandu, dourgandhya etc. One among the bahiparimarjana chikitsa is Parisechana with Aragavadadi Kashaya mentioned in Guhyarogapratishedadhaya of AstangaSangraha.² **MODE OF ACTION OF PARISECHANA** Prakshalana, Parisechana, Dharana, Lepa are few of the Bahirparimarjana Chikitsa followed in cases of YonivypaArtavadashti which yield very promising results. The word Parisechana means sprinkling. In Shweta Pradara there will be association of Kandu and Dourgandhya which derives the possibility of Krmi association. If the chikitsasootra of Krmi is looked into, the first step is Apakarshana followed by Prakritivighata and then Nidanaparivarjana is advised. Apakarshana means picking the Krimi with hands (Hastenaabhihrihya) or with instruments. The procedure of Parisechana requires continuous liquid flow which sprinkles on the surface and the secretion is washed out due to the pressure of the flow. This action can be compared to Apakarshana as there will be picking washing off the secretions through the flow of Kashaya. The next step Prakritivighata is achieved by the Kashaya which can be understood by its mode of action. Nidanaparivarjana is achieved through abstinence and maintenance of hygiene. **DISCUSSION ON RESULTS** It was found that the result on
Shwetasrava was highly significant with p value 0.001
Picchilata was highly significant with p value 0.001
Kandu was highly significant with p value 0.001
Dourgandhya was highly significant with p value 0.001
Kleda was highly significant with p value 0.001

The probable mode of action can be established by looking into the Rasapanchaka of the drugs present in the kashaya.

PROBABLE MODE OF ACTION OF ARAGVADADI KASHAYA

Rasa-Tikta rasa pradhana, Kashaya rasa Gun-Laaghu, rooksha guna Veerya-Ushna Vipaka-Katu
Tikta rasa is Krimighna, Kanduprashamana, Kledapashoshana, is rooksha and laghu.5
Kashaya rasa is Stambhana, ShareeraKledaachooshaka, is rooksha, laghu and sheeta. It helps in reducing the sraava.6
The laghu and rookshaguna which are opposite to guru and snigdhatguna helps in reducing picchilata and Kleda.
Tikta rasa is krimighna and also Kledapashoshana which reduces Kandu and in turn reduces Dourgandhya.
Ushnaverya helps in reducing Kapha dominancy.

CONCLUSION: Shwetapradara though secondary to many underlying disease can occur independently due to various causes. Assessment of proper nidana leads to successful treatment. Aragvadhadikashaya bears significant effect in curing ShwetaPradara with symptoms such as ShwetaSrava, Picchilata, Kandu, Dourgandhya and Kleda. The drug AragvadhadiKashaya acts as Krimighna and also does Stambhana and Shoshana of Srava which is achieved through its Rasapanchaka.

REFERENCES
3-Acharya Trikamji Yadavji (editor), Agnivesha, Charaka, Charaka Samhita. Varanasi: Chaukambha Ayurveda Academy; Reprint 2016. p 229
5-Acharya Trikamji Yadavji (editor), Agnivesha, Charaka, Charaka Samhita. Varanasi: Chaukambha Ayurveda Academy; Reprint 2016. p 144
6-Acharya Trikamji Yadavji (editor), Agnivesha, Charaka, Charaka Samhita. Varanasi: Chaukambha Ayurveda Academy; Reprint 2016 p 145

Corresponding Author:
Dr. Joshi Swati N., PG Scholar, Department of Ayurveda Samhita and Siddhanta, Government Ayurveda Medical College, Mysore, Karnataka.
Email: swatijoshi242@gmail.com
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