Efficacy of a combination of Unani drugs in patients of Trichomonal vaginitis

Wasim Ahmad1*, Azhar Hasan2, Ansari Abdullah3 & Tahera Tarannum2

1Department of Ilmul Advia, 2Department of Ilmul Qabalat wa Amraze Niswan, 3Department of Tashreehul Badan, Mohammadia Tibbia College and Assayer Hospital, Malegaon, Nashik- 423203, MS, India

E-mail: drwasim@gmail.com

Received 20.08.09; revised 15.10.10

A controlled, randomized single blind clinical trial was conducted in women suffering from Trichomonal vaginitis. After confirming the clinical and microbiological diagnosis, the patients were divided into two groups. The patients in control group were administered Metronidazole in a dose of 200 mg three times a day, for seven days by oral route. While the patients in the test group were treated with a combination of Unani drugs, i.e. pills made of Afsanteen (Artemisia absinthium Linn.), Kabab Chini (Piper cubeba Linn.) and Bahroza (Pinus longifolia Roxb.) and capsule of Mazu (Gall of Quercus infectoria Oliv.), twice a day, for 10 days, by oral route. They were also treated with intravaginal tampon made of Barge Neem (Leaf of Azadirachta indica A. Juss.), Haldi (Rhizome of Curcuma longa Linn.) and Phitkiree (Alum), at bed time, for 10 days. The findings suggest that test drugs have been proved effective and safe in treatment of Trichomonal vaginitis.

Keywords: Trichomoniasis, Unani medicine

IPC Int. Cl.5: A01D 12/00, A01D 12/31, A01D 12/37

Trichomonal vaginitis (Sh’ari Sa’alitee Iltehabe Mahbal) is the most common non-viral sexually transmitted infection of the genitourinary tract with approximately 120 million women worldwide diagnosed with this infection every year. The disease is caused by a pear shaped, actively motile, flagellated parasite, i.e. Trichomonas vaginalis. In spite of the prevalence of this disease at mass level, the choice of treatment available in modern system of medicine is comparatively few. Even the drugs available for the purpose are not devoid of side effects and often fail to cure the disease completely. The disease is usually treated with Metronidazole, a 5-nitroimidazole drug derived from the antibiotic azomycin. Common adverse reactions of Metronidazole are usually mild, although some patients do have reactions severe enough to necessitate halting Metronidazole therapy. Such a situation warrants some alternative arrangement for the treatment of a common ailment having potential of leading to diverse complications. As per the Unani literature the diseases occurs due to changes in the quality and quantity of Phlegm (Balgham). It is usually synthesized in the liver and used by the organs. When it becomes abnormal Quwate Jaziba does not absorb and Quwate Dafea excretes it. Unani system of medicine claims to possess a number of effective and safe drugs that can be used in the treatment of Trichomonal vaginitis. However, the major lacuna with the drugs of Unani medicine lies in the fact that the drugs are neither standardized nor scientifically evaluated on specific parameters for their efficacy and safety raising an element of doubt in the mind of modern medicine practitioners and the scientific community. Therefore, it is substantial to subjects this clinically very important group of drugs for scientific evaluation. If Unani medicine could offer more effective or even less effective but safer agent, a big need of western medicine would be fulfilled. A combination of Unani drugs, i.e. Pills made of Afsanteen (Artemisia absinthium Linn.), Kabab Chini (Piper cubeba Linn.) and Bahroza (Pinus longifolia Roxb.), capsule of Mazu (Gall of Quercus infectoria Oliv.) and intravaginal tampon of Barge Neem (Leaf of Azadirachta indica A. Juss.), Haldi (Rhizome of Curcuma longa Linn.) and Phitkiree (Alum), are also commonly being used in the management of Trichomonal vaginitis at Mohammadia Tibbia College and Assayer Hospital, Mansoora, Malegaon that is well supported by long legacy of Unani

*Corresponding author
physicians who are treating such patients successfully since a long without the report of any serious side effect. But despite being extensively used in the therapy, have not been so far, scientifically studied for their desired effect. Therefore, scientific evaluation of these drugs is quite necessary.

Methodology

Afisanteen (Artemisia absinthium Linn.), Kabab Chini (Piper cubeba Linn.), Bahroza (Pinus longifolia Roxb.), Mazu (Gall of Quercus infectoria Oliv.), Barge Neem (Leaf of Azadirachta indica A. Juss.), Haldi (Rhizome of Curcuma longa Linn.) and Phitkiree (Alum) were procured from local market of Malegaon and dried at room temperature. The drugs in their suitable dosage form were prepared after getting their identity and purity confirmed by a pharmacognostist. Afisanteen (Artemisia absinthium Linn.), Kabab Chini (Piper cubeba Linn.) and Bahroza (Pinus longifolia Roxb.) were taken in an equal quantity and powdered finely in an electric grinder. A semi-solid paste was made by addition of water in the powdered drug to make pills of pea size. The pills were made so that after drying each pill weighs 600 mg. The Mazu (Gall of Quercus infectoria Oliv.) was also powdered finely in an electric grinder and 500 mg of the powder was filled in an empty capsule. Barge Neem (Leaf of Azadirachta indica A. Juss.), Haldi (Rhizome of Curcuma longa Linn.) and Phitkiree (Alum) were taken in equal quantity and finely powdered in an electric grinder. The powdered drugs were mixed together and 3 gm drug was kept in a gauze piece to make tampon for local use.

The permission of Institutional Ethics Committee (IEC) was taken prior to the initiation of the clinical trial. The patients visiting the OPD of Department of Ilmul Qabalat wa Amraze Niswan, Mohammadia Tibbia College and Assayer Hospital, Mansoora, Malegaon during 2007-08, were screened for the presence of Trichomonas vaginalis on the basis of clinical signs and symptoms compatible with the classical description of the disease. The diagnosis of screened patients was however confirmed after pathological investigations. Sixty diagnosed patients of 18-45 yrs of age group were included in the study after taking the informed consent from them. They were informed about the disease, examination performed and type of treatment given. The patients suffering from candidiasis, chlamydial vaginitis, diphtheritic vaginitis, granular vaginitis, bacterial vaginitis, senile vaginitis, emphysematous vaginitis, vaginitis adhaesiva, neoplasm of cervix or vagina or any other systemic disease were excluded from the study.

The patients were divided into two groups of 30 patients each with the help of computer randomized tables/ numbers. The patients in group I were administered 5 pills and 2 capsules, twice a day, by oral route and also treated with intravaginal tampon at bed time for 10 days. While the patients in group II serving as standard control were treated with Metronidazole in a dose of 200 mg, three times a day for 7 days, per oral. Abstinence was advised and no concomitant therapy was allowed during the period of treatment.

At each visit the patients were carefully interviewed and their statement about the vaginal discharge, pruritus, burning micturition and dysuria, backache and inflammation of vagina were recorded. After general and systemic examination each patient underwent per vaginal examination in lithotomy position. Tenderness of vaginal wall and straw berry appearance of vagina and cervix was recorded by per speculum examination. Saline wet mount examination of vaginal discharge was done to confirm the diagnosis, before and after the treatment. Finally, recorded findings were statistically analyzed using chi square test.

Results and discussion

The test drugs were studied in the management of Trichomonal vaginitis by observing clinical sign and symptom and laboratory investigation. The findings were tabulated, analyzed and compared with the standard drug (Table 1). On the day of registration abnormal vaginal discharge was found in 100% of the patients, while after treatment it remained only in 13.33% and 6.66% of the cases in group I and II, respectively. Tenderness and congestion of vaginal wall on day zero, was found in 100% and 83.33% of the patients in group I and II, respectively. Whereas after treatment it had reduced to 6.66% in group I and totally disappeared in group II. Backache on day zero was found in 83.33% and 66.66% of the patients in group I and II, respectively, while after treatment it remained only in 3.33% of the cases in group I and totally disappeared in group II. Prior to the treatment dyspareunia was found in 43.33% and 30% of the cases in group I and II, respectively, while after
treatment, it totally disappeared in each group. Pruritus on day zero was found in 76.66% and 73.33% of the cases in group I and II, respectively, whereas after treatment, it totally disappeared in each group. Prior to the treatment strawberry spot was found in 60% and 30% of the cases in group I and II, respectively, while after treatment, it totally disappeared in each group. Prior to the treatment trichomonas in slide was present in 100% of patients in each group, while after treatment it remained only 6.66% in both groups. Relief in clinical symptoms along with reduction in microbiological count was considered as the criteria of efficacy. The cases having relief from abnormal vaginal discharge along with absence of trichomonas in slide after treatment were rated as cured. While the patients having no relief in abnormal vaginal discharge and trichomonas were found in slide after treatment, were rated as not cured. Complete cure was observed in 86.66% patients in group I and 13.33% cases were not cured. While 93.33% cases were cured in group II and 6.66% patients have not cured (Table 2).

As per the Unani literature the diseases occur due to irregular and disproportional distribution of the Akhlat (Humours). The Akhlat are classified in to four categories with four primary qualities. According to this Dam (Blood) is hot and moist, Balgham (Phlegm) is cold and moist, and Safra (Yellow Bile) is hot and dry, while Sauda (Black Bile) is cold and dry. The mucous fluid secreted from the vagina is a kind of Balghami Khilt. This disease also occurs due to change in the quality and quantity of Balgham. Thus, either the temperament (Kaifiyat) of Balgham is itself altered or some other normal or abnormal khilt is mixed with Balgham to the extent of altering its temperament and making it abnormal, or its quantity is altered. Theses abnormalities could be identified with various signs and symptoms produced by the abnormal Balgham due to alteration in its kaifiyat (quality composition) or kaiyiyat (quantity); or the abnormal forms could be identified by the chemical and physical examination of various samples of Balgham. It is usually synthesized in the liver and used by the organs. When it becomes abnormal, Quwate Maska (repetitive power) does not absorb and Quwate Dafea (expulsive power) excretes it. Thus the retention of morbid matters leads to the causation of vaginitis, and also invites various organisms to grow. It is one of the facts that wherever there is focus of infection in the body, the culture media is provided by Phlegm. In the other words Balgham is the first to catch infection. As it has been earlier discussed that the temperament of Balgham is barid ratab (cold, moist) because signs and symptoms manifested in most of the Balghami diseases are those which are attributed to burudat and rutubat (cold and moisture). The Trichomonal vaginitis is also a disease of khilt Balgham. It is obvious to treat the disease by the drugs whose temperament is hot and dry. Therefore, most of the drugs used to treat the disease having hot and dry temperament. The drugs selected for the present study, i.e. Afsanteen (Artemisia absinthium Linn.), Kabab Chini (Piper cubeba), Bahroza (Pinus longifolia Roxb.), Mazu (Gall of Quercus infectoria Oliv.), Barge Neem (Leaf of Azadirachta indica A. Juss.), Haldi (Rhizome of Curcuma longa Linn.) and Phitkiree (Alum), were also reported in classical and ethnopharmacological literature as anthelmintic, antiprotozoal, antiseptic and described to be effective in vaginal discharge. The drugs in form of pills and capsule were administered by oral route for systemic action while the tampon was used
intravaginally for local action. Because the vagina not only secretes; it absorbs water, electrolytes and the substances of low molecular weight. Absorption and re-absorption are believed to occur mainly in the lateral recesses of the lower vagina.

The study clearly showed that the test drug is very effective in Trichomonal vaginitis, which is evidenced by decrease in amount of abnormal vaginal discharge, tenderness and congestion of vaginal wall, backache, burning micturition and dysuria, dyspareunia, pruritus, strawberry appearance and trichomonas in slide. The efficacy of the test drugs may be attributed to their antiprotozoal activity which was almost equal to that of Metronidazole. Thus, the study validated the therapeutic regimen proposed by Unani physicians and their age old practice with the test combination in the management of Trichomonal vaginitis.

Acknowledgement

The authors are extremely grateful to Maulana Arshad Mukhtar, President, Al-Jamiatul Mohammadia Al-Khairiyah’s Mohammadia Tibbia College and Assayer Hospital, Mansoora, Malegaon for providing necessary facility to carry out the research and highly thankful to Prof. Ghufran Ahmad, Department of Ilmul Advia, Faculty of Unani Medicine, AMU, Aligarh for valuable guidance and moral encouragement during entire period of the study.

References

10. Al-Qarshi AA, Mojaz Al-Qanoon, (Matba Al-Nami, Lucknow), 1909, 34.
17. Dutt NB, Commercial Drugs of India, (Bishen Singh Mahendra Pal Singh, Dehradun), 1979, 166-167.
26. Nabi MG, Makhzan Mufradat wa Murakkabat maroof ba Khawasul Advia, (Matba Itefkar, Delhi), 1920, 42.
32. Thomas F, PDR for Herbal Medicine, (Medical Economic Comp), 2000, 829-830.