

CASE STUDY

Ayurvedic Management of Cholelithiasis (*Pittashmari*) – A Case Study

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ARTICLE INFO

Article history:

Received on: 18-02-2024

Accepted on: 20-03-2024

Published on: 31-03-2024

Key words:

Accha Pitta,
Cholelithiasis,
Gallstone,
Management,
Pittashmari

ABSTRACT

Gallstone formation, or cholelithiasis, is caused by a number of factors, including supersaturation of bile with cholesterol, accelerated nucleation of cholesterol monohydrate in bile, bile stasis, or delayed gallbladder emptying due to impaired gallbladder motility. After carefully rewriting Ayurvedic scriptures, we find that, because of its resemblance in location and function, the bile secreted from the gallbladder can be compared to the *Accha Pitta* stated in Ayurveda. We report that a case of cholelithiasis (*Pittashmari*) in a 31-year-old female patient had been complaining of severe abdominal pain, distension of the abdomen, and vomiting. Oral medications such as *Arogyavardhini vati*, tablet *Trikatu*, *Kashaya* of *Trivrit*, *Katuki*, *Sanaya*, *Arghvad*, and *Daruharidra* were administered to the patient for 3 months. A significant response was observed over clinical symptoms and USG reports. Ayurvedic remedies were used to treat the patient for 3 months. This case study demonstrates the efficacy of Ayurvedic treatment for cholelithiasis (*Pittashmari*). The study reached the conclusion that Ayurvedic therapy was significantly effective in the treatment of cholelithiasis (*Pittashmari*).

1. INTRODUCTION

The most frequent biliary tract problem is gallstone development. In contemporary medicine, the process of gallstone production is referred to as cholelithiasis. Gallbladder stones are found in about 5% of children, up to 10% of males and 19% of females between the ages of 30 and 69, and between 30% and 40% of those aged 70–80.^[1] Gallstones can affect both men and women, but middle-aged women are far more likely to get them. In addition, those who have diabetes, high cholesterol, obesity, or a genetic pre-disposition are more likely to develop gallstones. There are two types of gallstones: pigment stones, which are primarily composed of calcium bilirubinate, make up the remaining 20% of gallstones, and about 80% of gallstones include cholesterol. There are two varieties of gallstones that contain cholesterol: mixed stones (which contain 50–90% cholesterol) and cholesterol stones (which contain 90–100% cholesterol).^[2] Cholecystitis, or inflammation of the gallbladder wall, is typically present in association with gallstones. Gallstones are referred to as *Pittashmari* in Ayurveda, which also provides efficient treatment methods for them. Gallstones, which can develop inside the gallbladder, are hardened deposits of the

digestive juice bile. The quantity and size of these can vary. Usually, the gallbladder contains several little gallstones that are 0.5 cm or smaller. Occasionally, though, there may be hundreds of tiny stones the size of sand grains or a single, enormous gallstone up to 5 cm in diameter. When there is an imbalance in the bile's chemical composition, one or more of the elements precipitate, which leads to gallstones.^[3] The traditional Ayurvedic texts do not specifically mention the condition known as gallstones. In Ayurveda, the word “*ashmari*” refers to stone, and it is exclusively used in reference to *Bastigata Ashmari* or urinary calculi.^[4] Because of their similar functions and locations, the bile secreted by the gallbladder and the *Accha Pitta* stated in Ayurveda can be connected. In Ayurveda, the gallbladder is referred to as *Pittashaya* (the organ that stores Pitta) and *Pittashmari* (the stone that forms in it).

2. CASE STUDY

A 31-year-old Hindu woman with acute abdominal discomfort, distension, and vomiting presented herself to the outpatient clinic. According to a history of the current condition, the patient was reported to be asymptomatic 6 months prior. She was experiencing distension in her abdomen, vomiting, and anorexia when she suddenly discovered pain in the right side of her abdomen that was not radiating. After consulting with an allopathic physician, she was advised to undergo a

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USG scan of her abdomen and pelvis. The results revealed that she had a single, 13.8 mm-sized gallbladder stone, for which she would need surgery. She saw an Ayurvedic physician and received treatment for her unwillingness to have surgery. According to the patient's personal history, the patient has a mixed diet, decreased appetite, regular micturition (4–5/D 2–3/N), and no addiction. Three days of regular flow followed a 28-day regular cycle in menstrual history.

2.1. Personal History

Person history details are given in Table 1.

2.2. Systemic Examination of the Patient

2.2.1. On inspection

Mild distension of the abdomen was observed.

2.2.2. On palpation

Severe tenderness was noted over the right hypochondriac region. USG impression: cholelithiasis (multiple stones with a large stone measuring about 13.8 mm in size).

2.3. Eight Types of Examination

Eight type of examinations details are given in Table 2.

2.4. Management

The process of treatment was as follows:

1. *Arogyavardhini Vati*^[5] has been given 2 tablets twice a day after food with warm water
2. Tablet *Trikatu*^[6] has been given 1 tablet twice a day after food with warm water
3. *Kshaya of Trivrit, Katuki, Sanaya, Arghvad, and Daruharidra* (20 mL) twice daily with 30 mL of warm water before food.

So far as subjective parameters are concerned, the patient started feeling better from the very beginning (i.e., 1 month after the introduction of medicines). These medications were continued for 3 months, and follow-up visits, symptoms were assessed. *Arogya Vardhini Vati* is given for 3 weeks, then breaks for 1 week, and then the patient has been advised to continue *Arogya Vardhini Vati* for another 1.5 months.

Total duration: 3 months

3. RESULTS

After completing a 3 months of medicine course, the patient was called to discuss a further line of treatment. The patient was advised to undergo USG abdomen to check the prognosis. The changes in Subjective criteria and USG before and after treatment are mentioned in Table 3 and Table 4. The USG reports are also attached below for references.

4. DISCUSSION

The patient was diagnosed as having a *Pittashmari* case with predominant Kapha and Vata Dosha based on the clinical presentation, which included abdominal pain, anorexia, distension of the abdomen, and vomiting. As a result, the mainstay of treatment consisted of *Shoolahara*, which is known to relieve pain; *Shothahara*, which is known to be anti-inflammatory; *Deepana-Paachana*, which is known to be an appetizer and carminative; *Agni Deepaka*, which is an appetizer; and *Ashmari Bhedaka*, which helps eliminate calculi.

4.1. Arogyavardhini Vati

Arogyavardhini Vati's constituents are all Madhura-possessed, and the combination of *Tikta* and *Kashaya Rasa* causes *Pitta Kaphahara*. *Deepana* (appetizer), *Paachana* (carminative), *Agnivardhan* (appetizer), *Bhedana Karma* (cathartics), *Ashmaribhedana* (assists in removing calculi), and *Shothaghna* (reduces inflammation) are the main karma of the ingredients.^[7]

According to the creators, the *rogagnata* of nearly all medications is *Shothahara*, an anti-inflammatory, and *Yakrit Prasadaka*, a liver tonic, aids in the restoration of *Yakrit's Prakrita Karma*. Mineral *Shuddha Shilajatu* works well as a revitalizing agent. It functions similarly to nectar, contains strong antioxidant properties that slow down the aging process, and helps treat digestive, kidney, and liver illnesses, among other conditions. By transforming cholesterol into bile, the oleo gum resin of *guggulu* (*Commiphora mukul*) aids in the removal of cholesterol. It is a useful treatment for cutting off excess fat and bringing cholesterol levels back into balance. The herb *Plumbago zeylanica*, also known as *Chitraka*, is a useful remedy for indigestion, other liver problems, and appetite loss.^[8]

4.2. Tablet Trikatu

It aids in a healthy digestive system and stimulates hunger. In Ayurveda, the term "*trikatu*" refers to the potent blend of black pepper, long pepper, and ginger (*Sunthi*), which provides the *piperine* and *gingerol*, the active constituents in these tablets.^[9] By stimulating the digestive system, these substances help to ease digestive issues and create the enzymes required for a healthy digestive system.

4.3. Kshaya of Trivrit, Katuki, Sanaya, Arghvad, and Daruharidra

A combination of these medications, known as *Ashmaribhedaka*, aids in the breakdown of *Pittashmari*, *Deepana*, and *Pachana*. *Karma* performs *Amapachana* and corrects *Agni*. *Samprapti Vighatana* is aided by most medications being *Kaphavatahara*, and *Karma* being *Shothahara* helps reduce inflammation.

5. CONCLUSION

The patient in this case study has demonstrated positive outcomes while receiving treatment for cholelithiasis (*Pittashmari*). According to the USG abdomen, the patient's overall condition improved, and within 3 months of treatment, a 13.8-mm stone was removed. Thus, it can be concluded that *Arogyavardhini Vati*, *Trikatu* tablet, and *Kshaya of Trivrit, Katuki, Sanaya, Arghvad, and Daruharidra* have demonstrated a noticeable improvement based on observation and the findings of this case study.

6. ACKNOWLEDGMENTS

None.

7. AUTHORS' CONTRIBUTIONS

All the authors contributed equally in the design and execution of the article.

8. FUNDING

Nil.

9. ETHICAL APPROVALS

This study does not require ethical clearance as it is a case study.

10. CONFLICTS OF INTEREST

Nil.

11. DATA AVAILABILITY

This is an original manuscript, and all data are available for only review purposes from the principal investigators.

12. PUBLISHERS NOTE

This journal remains neutral with regard to jurisdictional claims in published institutional affiliations.

REFERENCES

1. Dancygier H. Clinical Hepatology: Principles and Practice of Hepatobiliary Diseases. Vol. 2. Berlin: Springer Science and Business Media; 2009. p. 1459.
2. Gaby AR. Nutritional approaches to prevention and treatment of Gallstones. *Altern Med Rev* 2009;14:258-67.
3. Available from: <https://www.niddk.nih.gov/health-information/digestive-diseases/gallstones/definition-facts> [Last accessed on 2024 Jan 10].
4. Tripathi R. Charakasamhita with Vidyamanorama Hindi Commentary. Chikitsasthana 26/36. Delhi: Chaukhamba Sanskrit Pratishthan; 2009. p. 630.
5. Shah NC. Bharata Bhaishajya Ratnakara, Aakaradi Rasa Prakarana, Prathama Bhaga. Verse no. 448. 3rd ed. New Delhi: Jain Publishers; 2005. p. 154.
6. Available from: <https://munialayurveda.in/products/trikatu-tablets> [Last accessed on 2024 Jan 10].
7. Available from: <https://www.ayurmedinfo.com/2012/07/10/arogyavardhini-vati-benefits-dosage-ingredients-side-effects> [Last accessed on 2024 Jan 10].
8. Sarup P, Bala S, Kamboj S. Pharmacology and phytochemistry of oleo-gum resin of *Commiphora wightii* (Guggulu). *Scientifica (Cairo)* 2015;2015:138039.
9. Available from: https://www.researchgate.net/publication/329129608_trikatu_-_a_combination_of_three_bioavailability_enhancers [Last accessed on 2024 Jan 10].

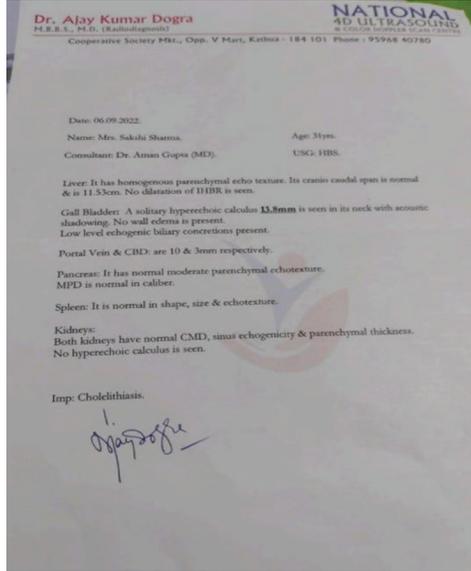
How to cite this article:

Gupta A, Gupta M. Ayurvedic Management of Cholelithiasis (*Pittashmari*) – A Case Study. *IRJAY*. [online] 2024;7(3):18-21.

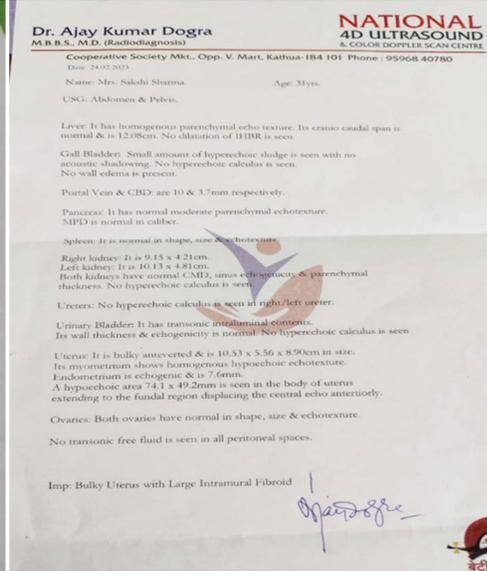
Available from: <https://irjay.com>

DOI link- <https://doi.org/10.48165/IRJAY.2024.70304>

USG REPORT



Before Treatment



After Treatment

Table 1: Personal history of patient

Diet	Vegetarian
Micturition	4-5/D, 2-3/N
Appetite	Poor
Sleep	Disturb
Bowel habit	Irregular
Menstrual cycle	regular (5/28 days)
Addiction	Nil

Table 2: Eight types of examination of patient

Pulse	72/min, regular, normal in character
Stool	Constipation
Urine	frequency-normal
Tongue	Clear
Speech	Clear
Touch	Normal
Eyes	Normal
Built	Medium

Table 3: Subjective assessment of symptoms

S. No	Symptoms	Grading	BT	AT
1.	Heaviness of the abdomen	0-No heaviness after taking food 1-Mild heaviness after taking food 2-Moderate after taking food 3-Severe after taking Food	3	0
2.	Nausea	0-No nausea 1-Mild nausea not requesting pharmacological rescue 2-Moderate nausea requesting pharmacological rescue 3-Severe resistant to pharmacological rescue	2	0
3.	Pain	0-No pain 1-Mild pain 2-Moderate pain 3-Severe pain	3	0

AT: After treatment, BT: Before treatment

Table 4: USG abdomen findings

Before Treatment	After Treatment
GB distended- A solitary hyperchoic calculus 13.8 mm is seen in its neck with acoustic shadowing. No wall edema is present. Low level echogenic biliary concretions present	Small amount of hyperchoic sludge is seen with no acoustic shadowing. No hyperchoic calculus is seen. no wall edema is present.