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Article

The Use of Homeopathic Medicines for the Treatment of Mastalgia and Mastopathy

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Abstract: The Mastalgia and fibrocystic mastopathy (FCM) are prevalent benign breast disorders among women of reproductive age, often leading to physical discomfort and psychological distress. Despite a high incidence, standardized treatment protocols remain elusive. This study addresses the therapeutic gap by exploring the efficacy of homeopathic remedies, particularly Mastopol, in managing mastalgia and FCM. A clinical investigation was conducted on 40 women (average age 39.1 years) experiencing symptoms of mastopathy. Over an 8-week course, participants received Mastopol sublingually three times daily. The treatment led to significant clinical improvement: 50% of the women experienced complete relief from breast pain, while the remaining reported reduced symptom intensity. Ultrasound findings confirmed a decrease in the size and density of cystic formations in half of the cases. No adverse events were recorded, and patient satisfaction was high, with 90% rating the outcomes as "good" or "very good." The findings support the use of homeopathic treatment as a safe and effective non-hormonal alternative for managing benign breast conditions. These results underscore the therapeutic potential of Mastopol and similar remedies, emphasizing the importance of individualized, low-risk approaches to women's health. Further research in broader populations is recommended to validate these outcomes. According to the WHO definition (1984), mastopathy is a fibrocystic disease characterized by a violation of the ratio of epithelial and connective tissue components, a wide range of proliferative and regressive changes in the tissues of the mammary gland. Along with the term "mastopathy", the terms "diffuse fibrocystic mastopathy", "diffuse cystic mastopathy", "mammary gland dysplasia" are used to designate this pathological condition.

Keywords: Breast disease, mastalgia , breast pain, cyclic pain, fibrocystic breast disease, menstrual cycle, non-hormonal treatments, homeopathy.

Introduction

Benign breast disorders, particularly mastalgia and fibrocystic mastopathy (FCM), represent some of the most frequently encountered conditions in women of reproductive age. Characterized by cyclical or non-cyclical breast pain, tissue engorgement, and cyst formation, these conditions often cause substantial discomfort and emotional distress [1]. According to the World Health Organization, mastopathy encompasses a spectrum of fibrocystic changes in breast tissue resulting from hormonal imbalances. Despite their non-malignant nature, such disorders significantly impact quality of life

and require timely and effective management to prevent complications or misdiagnosis of malignancies [2].

Conventional therapies for mastalgia and FCM include hormonal and non-hormonal treatments. Hormonal therapies, while effective, are associated with a variety of side effects and are contraindicated in certain populations—particularly smokers, older women, and those with thrombotic risk factors [3]. This has led to increased interest in alternative and complementary approaches. Among these, homeopathy—an individualized, low-risk modality based on the principle of "like cures like"—has emerged as a promising avenue. It utilizes highly diluted natural substances to stimulate the body's self-healing mechanisms, aligning with holistic theories of disease management and personalized care [4,5]. While anecdotal and preliminary clinical reports support the effectiveness of homeopathic remedies in treating mastalgia, systematic studies remain limited. Previous research has focused predominantly on pharmaceutical interventions, leaving a notable gap in evidence-based evaluation of homeopathic alternatives [6]. Existing studies on preparations like Mastodinone and Mastopol have shown positive outcomes, yet comprehensive clinical assessments, particularly in controlled settings, are still insufficient. Thus, there is a need to validate these findings through focused observational or experimental approaches [7].

This study aims to address this gap by evaluating the clinical efficacy and safety of the homeopathic complex preparation Mastopol in the treatment of mastalgia and mastopathy [8,9]. The methodology involves administering Mastopol over an 8-week period to a sample group of women experiencing FCM-related symptoms, followed by clinical, ultrasound, and patient-reported outcome assessments. The expectation is that homeopathic therapy can significantly reduce symptom intensity and improve breast tissue structure without adverse effects, offering a viable alternative to hormonal treatments [10]. The findings suggest that Mastopol demonstrates high efficacy in alleviating breast pain and reducing cyst size, as supported by both subjective symptom relief and objective ultrasound improvements. The implications of this study are substantial: it supports the integration of homeopathic remedies into the broader therapeutic arsenal for benign breast diseases and encourages further clinical research to explore their full potential [11,12]. Homeopathy, due to its safety profile and individual-centered approach, could play a pivotal role in enhancing the quality of care for women with mastalgia and mastopathy.

Materials and Methods

This study was conducted to evaluate the therapeutic efficacy and safety of the homeopathic medicine Mastopol in the treatment of mastalgia and fibrocystic mastopathy (FCM) in women of reproductive age. A total of 40 women, with an average age of 39.1 ± 0.1 years and clinically diagnosed with mastalgia and signs of FCM, participated in the study. Patients were selected based on symptom severity, including breast pain, tissue engorgement, and ultrasound-confirmed presence of cystic formations not exceeding 1.3 cm in diameter. Participants were administered the homeopathic preparation Mastopol in tablet form, taken sublingually at a dosage of one tablet three times daily, either 30 minutes before or 1 hour after meals. The treatment course lasted for eight weeks. Clinical evaluations were conducted at baseline and after completion of the treatment period. Data collection included physical breast examination, patient self-reports regarding pain intensity, and ultrasound imaging to assess changes in the size and structure of breast cysts. Throughout the study, participants were monitored for adverse effects and treatment tolerability. The effectiveness of the therapy was evaluated based on both subjective symptom relief and objective clinical improvements. Data were analyzed to determine the proportion of patients experiencing complete or partial relief from mastalgia, reduction in cyst size, and overall patient satisfaction. The study was observational in design and did not involve the use of placebo or control groups, focusing instead on real-world therapeutic outcomes in a defined clinical population.

Results and Discussion

In recent years, there has been a high prevalence of pathological conditions and diseases of the mammary glands. Such conditions include mastodynia or mastalgia - unilateral or bilateral pain in the mammary glands of varying intensity, which can be a manifestation of functional and organic diseases of the mammary gland [13, 14].

Mastalgia may be an initial sign or one of the symptoms of fibrocystic mastopathy (FCM) [17] — the most common benign pathology of the mammary glands. FCM occurs in a quarter of women under 30 years of age, with the peak incidence occurring at age 45 [15, 16, 18].

Mastalgia or mastodynia, depending on the cyclicity of their occurrence, are classified as non-cyclic, cyclic and extramammary [19]. Non-cyclic mastalgia (not associated with the menstrual cycle) can occur as a result of trauma, mastitis, thrombophlebitis, cysts, precancerous and tumor processes, during pregnancy [20, 21].

It may be a symptom of sclerosing adenosis, adenoma and fibroadenoma, reactive sclerosis of connective tissue, breast cancer. Non-cyclic mastalgia can be observed when taking antidepressants, spironolactone, methyldopa, reserpine, ketoconazole, metronidazole, as well as during treatment with gestagens, clomiphene, estrogens and other drugs. Hormonal replacement therapy and hormonal contraception in some women can also cause acyclic mastalgia , especially in the first months of taking hormonal drugs [22, 23, 24]. Pain in the mammary glands associated with the menstrual cycle and occurring in the second phase of the menstrual cycle is usually referred to as "cyclic mastalgia". Cyclic pain occurs in more than 2/3 of women, bothers a woman for seven or more days of the luteal phase of the menstrual cycle, being one of the leading symptoms of premenstrual syndrome [25] and caused by the presence of endocrine-metabolic disorders that occur in women with this pathology. Extramammary , unrelated to the mammary gland, chest pain can be caused by inflammation of the osteochondral joints of the spine, osteochondrosis, scapulohumeral periarthritis, intercostal neuralgia [11].

Mastalgia can be the initial or one of the main symptoms of FCM, the predisposition to which can be caused by family history, previous breast diseases, parity, menstrual function characteristics, duration of lactation, previous gynecological and extragenital diseases, endocrine disorders, social and domestic factors and some other factors [26,27].

Mastopathy is a generalized name for benign changes in the mammary glands that differ significantly from each other in anatomical features, clinical manifestations and the risk of malignancy [28].

Cystic disease of the mammary gland was first described by Cooper in 1829. The term "serous cystic tumor of the mammary gland" to define mastopathy was proposed by R. Brodi in 1840, and in 1892 Schimmelbusch proposed to call this pathological condition "cystic adenoma" [29]. The main manifestation of mastalgia is unilateral or bilateral pain of varying intensity in the mammary glands. The main manifestations of FCM are pain of varying intensity in one or both mammary glands, occurring most often in the second half of the menstrual cycle and disappearing with the onset of menstruation or in the first days of menstruation. Pain can radiate to the axillary region, shoulder and shoulder blade, in some women the pain is constant, independent of the phase of the menstrual cycle [30]. A woman may be bothered by engorgement (mastodynia), swelling and an increase in breast volume. Sometimes bloody, serous, milky, or purulent discharge from the nipples appears. In some women, the disease is asymptomatic, and women seek medical attention if they detect lumps in their glands [31].

To diagnose pathological conditions and diseases of the mammary glands, it is recommended to conduct a manual examination in combination with instrumental methods, including clinical examination, mammography, ultrasound examination and other methods (radiothermometry) aimed at excluding tumor processes in the mammary glands. Therapy of functional, dyshormonal and organic diseases of the mammary glands must necessarily include the elimination of the causes leading to the development of pathological processes in the mammary glands. Timely and effective

treatment is not only the key to maintaining women's health, but also allows you to maintain a woman's individuality, psychological balance (Prilepskaya V.N., 2020). Currently, there are no uniform standards for sound pathogenetic therapy of functional conditions and benign diseases of the mammary glands. A wide range of drugs with different focuses is used for their treatment. These are homeopathic, herbal, vitamin, tonic agents, drugs that normalize the psychoemotional state, hormonal drugs [32].

Non-hormonal treatment methods can be divided into several groups:

- homeopathic therapy;
- phytotherapy;
- vitamin therapy;
- iodine preparations;
- psychotropic drugs;
- non-steroidal anti-inflammatory drugs;
- vitamins; enzyme preparations;
- immunomodulatory drugs;
- physiotherapy procedures;
- other drugs.

For a long time, iodine preparations, herbal infusions and vitamin complexes were used to treat dyshormonal pathology of the mammary glands. However, iodine preparations were prescribed without taking into account the state of the thyroid gland. Herbal infusions, as a rule, having a diuretic effect, could not be prescribed for a long time, in addition, allergic reactions to the components of the infusions and various plants could be observed during herbal treatment. The use of hormonal drugs is also associated with certain difficulties. When taking estrogen-progestogen drugs, the risk of developing vascular and thrombotic complications increases, although to a small extent. Hormonal drugs are not recommended for women who smoke over 35 years of age, have a history of thrombotic complications, suffer from severe diabetes, severe liver disease and some other diseases. In these situations, a promising direction in conservative therapy of mammary gland pathology is currently the use of homeopathic remedies.

Homeopathy is a method or system of treating acute and chronic diseases using specially prepared medicines containing very small doses of active components, which in large doses cause similar painful manifestations. The main difference between homeopathy and scientific medicine is that if in academic medicine the use of drugs is etio- and pathogenetically justified, then in homeopathy the action of drugs is aimed at maintaining and activating the body's defenses, helping the body to cope with the disease on its own [32]. Homeopathy is characterized by a strictly individual approach to the patient and the idea of any disease as a suffering of the entire organism as a whole [4].

Homeopathic medicines are prepared using natural raw materials of plant, animal and inorganic origin, therefore homeopathic remedies have virtually no side effects and are indicated for the treatment of a wide range of pathological conditions. The results of a study of the homeopathic drug Mastodinone in the treatment of mastalgia , its high efficiency and good tolerability were previously presented by us and other scientists and clinicians. According to our research, the effectiveness of Mastodinone in the treatment of mastalgia caused by taking combined oral contraceptives was more than 60% [5, 6]. The effect of the homeopathic drug Mastopol , like other homeopathic drugs, is due to the fact that it contains the following active components in fairly high homeopathic dilutions:

- Conium maculatum (Conium) conium Maculatum C6–0.075 g;
- Thuja occidentalis (Thuja) thuja occidentalis C6–0.075 g;
- Hydrastis canadensis (Hydrastis) hydrastis canadensis C3-0.075 g;

• Calcium fluoratum — calcium fluoratum C6 - 0.075 g.

Conium maculatum, or spotted hemlock, contains alkaloids, the main ones being coniine, as well as methylconiine, conidrine, pseudoconidrine, and coniceine. In folk medicine, hemlock is used as a sedative, anticonvulsant, anti-inflammatory, and analgesic [33]. Hemlock is used for painful conditions accompanied by convulsions or spasms (chorea, epilepsy, whooping cough, migraine), as well as for gastric and intestinal colic, anuria, anemia, and dysmenorrhea. Traditionally, an alcohol tincture from the fresh plant was used as one of the best remedies for cancer, enlarged lymph nodes, scrofula, anemia, and a number of other conditions [2].

Thuja occidentalis (thuja, or tree of life) - contains active components monoterpenes - thujone, isothujone , fenchone , sabines , alpha- pinene and other monoterpenes, as well as borneol, thuja and formic acids [25].

Various parts of the thuja plant are widely used in folk medicine to treat benign skin tumors, condylomas and papillomas, warts, and polyps. There are reports of the use of infusions and decoctions of thuja leaves and bark as a diaphoretic, diuretic, and used to treat colds, coughs, fever, headaches, toothaches, and rheumatism [22].

Experimental studies conducted by Sunila ES, Kuttan G. (2021), Biswas R. et al. (2022) showed that thuja extract has anticarcinogenic, apoptosis-inducing activity [29, 19].

Thuja was introduced into homeopathy by Hahnemann in 1818 and is currently very widely used for the preparation of homeopathic medicines [27].

Hydrastis canadensis — goldenseal. Medicinal raw materials from goldenseal contain isoquinoline alkaloids — berberine, hydrastine and canadine . Preparations from this plant have a pronounced tonic effect, stimulate the immune system, promote the secretion of gastric juice, and improve appetite. Goldenseal is used in the form of a liquid extract for internal bleeding, and also as a tonic, anti-inflammatory and hypotensive agent [18].

Goldenseal is considered one of the most active natural antibiotics [21].

In connection with the above, the complex homeopathic preparation Mastopol , which contains substances from the listed plants, is of interest. Mastopol is used 1 tablet 3 times a day half an hour before meals or 1 hour after meals sublingually . The course of treatment is 8 weeks with the possibility of extending or repeating the treatment upon agreement with the doctor. Thus, according to the results of a study conducted on the basis of 70% of women receiving Mastopol (40 women, average age of the included 39.1 ± 0.1 years), there was a weakening of the signs of fibrocystic disease by the second month of treatment, which was manifested by a decrease in the density, stringiness and tension of the breast tissue. According to ultrasound data after two months of treatment, 50% of women received objective confirmation of positive dynamics, expressed in a decrease in the size of cystic formations (the initial size of the cysts was no more than 1.3 cm in diameter). By the second month of observation, 50% of women receiving Mastopol showed the most pronounced therapeutic effect in the form of disappearance of mastalgia . The remaining 50% showed a decrease in the intensity of mastalgia symptoms to moderate and mild [33]. During treatment with Mastopol , no serious adverse events or reactions were recorded. According to patients' assessments, in 90% of cases the effect of treatment with Mastopol was assessed as "good" and "very good" [10].

Thus, the results of the studies indicate the high efficiency of homeopathic preparations in the treatment of mastalgia and mastopathy in women of reproductive age. The therapeutic effect was evident after four weeks of taking Mastopol .The main advantage of homeopathic preparations was the rapid elimination of pain symptoms and high efficiency in treatment, confirmed by clinical and laboratory data, which allows recommending Mastopol and other homeopathic preparations for the treatment of certain benign pathological conditions of the mammary glands. In this case, examination and treatment, especially when organic lesions are detected, should be carried out in specialized medical institutions or with the involvement of mammologists.

Conclusion

In conclusion, the findings of this study demonstrate that the homeopathic preparation Mastopol is an effective and well-tolerated therapeutic option for the treatment of mastalgia and fibrocystic mastopathy in women of reproductive age. The majority of participants experienced significant clinical improvement, with 50% reporting complete resolution of pain symptoms and the remaining showing a marked reduction in symptom intensity. Ultrasound data further supported these outcomes, revealing a decrease in the size and density of cystic formations in half of the cases. The absence of serious adverse effects and high patient satisfaction rates underscore the safety and acceptability of this treatment approach. These results suggest that homeopathic remedies, particularly Mastopol, offer a promising non-hormonal alternative for managing benign breast conditions, especially in populations contraindicated for conventional hormonal therapies. The implication of this research lies in broadening the therapeutic options available to clinicians and enhancing patient-centered care strategies in breast health management. However, further large-scale, randomized controlled trials are necessary to validate these findings, clarify the mechanisms of action, and determine the long-term efficacy and safety of homeopathic treatments in diverse patient populations.

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