Living with Mastalgia

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Abstract
Aim: To study the impact of mastalgia on women life.

Design and Department: A single blind study carried out from August 2016 to February 2017 in Sher-I-Kashmir institute of Medical Sciences Soura.

Patients: A total of 100 patients with Mastalgia were enrolled in our study, aged between 18 to 45 years.

Methodology: patients with Mastalgia attending to clinic were randomly chosen. Only those patients were excluded who had history of breast surgery, breast cancer, lactating mother, Breast abscess pregnant, and post-menopausal females.

Results: Of the 100 Patients, 72% had cyclical mastalgia and 28% had non-cyclical mastalgia. Severity of pain was calculated on VAS score. 61% had mild pain (vas-2-4), 24% patients had moderate pain (vas 5-7) and 15% had severe pain (vas 8-10). 60% of patients had pricking sensation, 10% of patients had sharp shooting pain, 5% patients had heavy ache and 15% patients had splitting gnawing type of pain. 35% of patients had pain that affected their sexual activity and sleep. 15% of patients reported that their work and social activities were affected with certain degree of anxiety and depression at some stage of disease.

Conclusion: Mastalgia affects 60-70% of females in their lifetime. Some of the patients get treated by simple re-assurance/counseling, change in lifestyle, medication, and by removing fear of cancer. The patients who do not respond to treatment have a negative effect on quality of life.

Keywords: Mastalgia, Cyclic mastalgia, Non cyclic mastalgia, Visual Analog scale, Breast pain questionnaire.

Introduction
Mastalgia (Breast pain) was described in medical literature as early as 1829 and is a common complaint among women. Mastalgia is a very common and enigmatic condition. It may be severe enough to interfere with usual daily activities and its effect on quality of life is often underestimated. Mastalgia is divided into two groups, Cyclical and non cyclical mastalgia. Mastalgia that appears 7-10 days before...
menstruation, lasting 1-4 days and causing slight pain is considered as cyclical mastalgia. It is thought to be due to hormonal influence and is seen in 8-10% Pre-menopausal women. Non-cyclical mastalgia is another type of mastalgia the pain of which does not correlate with menstruation as in cyclical mastalgia and is felt throughout the whole month. Some breast pain or discomfort is experienced by about two third of women during the pre-menstrual phase. This pain is mild, lasts for a short time in the premenstrual phase, but more importantly it resolves with menstruation, therefore it can be considered within the spectrum of normal physiology. The development of severe pain which may last for most of the menstrual cycle is considered as abnormal and may significantly interfere with patients day to day activities. Approximately 60-70% of women experience some type of breast pain at some stage of their lives and in 10-20% cases it is severe.

Severe mastalgia can have a negative impact on the woman’s quality of life. It has been linked to disruption of sexual (48%), social (12%) physical (37%) activity and behavior.

**Material and Method**

This prospective study was carried out on 100 female patients with mild to severe pain at surgical outpatient department of skims Srinagar from August 2016 to February 2017. Female patients aged between 18-45 years of age were randomly included in the study.

The following types of patients were excluded from the study:

- Patients of breast carcinoma
- Patients with breast abscess
- Pregnant females
- Lactating females
- Those who underwent breast biopsies

During the first visit a detailed clinical history and physical examination was done. Ultrasonography and FNAC were done only in patients with lumps to rule out breast cancer. Mammography was done in patients who were above 40 years of age.

Before starting the treatment, questionnaire relating to breast pain were given to patients only after taking consent from them. The patients who agreed to participate in the study were requested to answer a questionnaire after assuring them of confidentiality.

Patients were explained about their hormonal changes and were asked to maintain the breast pain chart. The days of period were marked as “P” . The patient’s pain was measured on Visual analogue score.

There were 14 questions related to mastalgia which were copied from Northwestern University and modified for the patients. The questionnaires were aimed to see the effects of mastalgia on the day to day life of females. The questionnaire provides information about the characteristics of breast pain, such as pain pattern, degree of pain and relationship with menstruation, further more it is accepted as a quick assessment tool that can be used in daily practice.

**Visual Analog Scale**

The severity of pain was calculated with visual analog scale. It is a continuous scale comprising of a horizontal line 10 cm in length where 0 means no pain and 10 means worst possible pain.
Breast Pain Questionnaire

Name                                                      Age

Have you ever been diagnosed with breast cancer? 
Yes/No

Have you experienced pain within last three months? 
Yes/No

If yes please fill continue to fill the rest of survey.

2. What does your breast pain feel like (none, mild, 
moderate or severe) for each description

3. What is the amount/score of breast pain. Write 
number between 0 and 10, where 0 means no pain 
and 10 denotes worst pain

4. Which word below describes the amount of your 
overall breast pain? Check out

   I. Mild
   II. Discomforting
   III. Distressing
   IV. Horrible
   V. Excruciating

5. How does your breast pain change with time?
   (A) Describe the pattern of your breast pain. 
   - Continues
   - Rhythmic
   - Steady
   - Periodic
   - Constant
   - Intermittent
   - Brief
   - Momentary
   - Transient

   (B) What kind of things relieve your breast pain. 
   (C) What kind of things increase your breast pain.

6. Is your breast pain related to your menstrual cycle. 
   ________      ______

   If YES

   On which day is your breast pain worst 
   write a number between 0 and 28 where 28 
   indicates menstruation

   How long your breast pain usually last? 
   Write a number between 0 and 28 where 28 
   indicates menstruation

7. How often does your breast pain occur. Check out
   - Every hour - every day - every week - every month 

8. How long have you had breast pain. 
   Number of months
   Number of years

9. Where does the pain occur. Please shade the 
painful area

10. Has your breast pain affected your work 
schedule  yes____ no____

11. Has your breast pain affected your sleep 
    yes ___ no____

12. Has your breast pain affected your sexual 
    activity yes_____ no____
13. Do you take medication to relieve breast pain
   Yes___ no____
if yes Type of medication
Dosage/ frequency!!!!

14. Do you have other pain besides breast pain.
   Yes…….. no…..
if yes how often does it coincide with your breast pain
   yes ……. No…… 
do you take any medication to relieve this
   yes … no….. which medication

Results
The mean age of patients in our study 33. 72% patients had cyclical mastalgia whereas 28% had non cyclical mastalgia. 48 patients had pain in the Left breast. 20 had bilateral pain and 32 patients had pain in left breast. 40 patients had been taking medicine for mastalgia over a period of 6 months to 1 year. 12 patients had pain referred in arms and neck. 53 patients had pain two weeks before menstruation, 32 patients had pain between 2nd and 4th day of menstruation. 15 patients had pain all throughout irrespective of the cycle.
61% of patients had mild pain with a VAS score of 3-5. 24% patients had a moderate to severe pain with a VAS score of 5-7. 15% patients had severe pain with a vas score of 8-10.
The study revealed that patients with VAS score of 3-5 were able to carry out their daily activities without any apprehension.
Patients with VAS score of 5-7 had problems sleeping and sexual activities’
Patients with VAS score of 8-10 had problems with their sleep, sex, social life and daily activities.
15 patients had severe mastalgia affecting their sexual activity. 5 patients had difficulty in sleep pattern and 4 patients had difficulty at work.
In our study 60% patients had pricking type of pain, 10% had burning pain whereas 10% had sharp, shooting and stabbing pain. 5% patients had heavy ache with throbbing sensation. 15% patients had severe splitting/gnawing type of pain.

Discussion
Although mastalgia is most common reason for breast related symptoms, patients consult general surgery outpatient clinic, its etiology has not yet been clarified and it reduces quality of life considerably9,10.
Various treatment modalities have been offered to patients from reassurance, tight fitting bra, active physical life to evening primrose oil, vitamin E , topical use of NSAIDs as a first line of treatment for mild to moderate mastalgia and hormonal agents like danazol, tamoxifen, bromocriptine, centchrome for moderate to severe mastalgia. Response has been noticed in various studies 5,11,12,14.
Patients with severe mastalgia who do not respond to treatment have a negative impact on the quality of life. Among non responder, patients it is observed that anxiety and depression are high as observed by Preece Pe etal14 and Cakr etch15 and Yilmaz ED etal16. Whether stress is the result of the pain or a contributory factor, Psychological assessment and support is an integral part of the management of mastalgia.
Our study showed that 72% patients had cyclical mastalgia. In our study we noticed that 53% patients had pain more during their menstruation whereas 32% patients had pain at the onset of menstruation and this observation is in consistent with the study of SA Kan and AV Apkeria17.
We had 15% of patients who had severe mastalgia with splitting and gnawing type of pain, Carmiched18 and colleagues observed 11% of patients who had excruciating pain and 7.5% patients in the study of Vaziri F et al19.
In our study breast pain was reported to affect quality of life with 35% of patients reported that breast pain affected their sexual life, 15% of patients with mastalgia reported that their work activities were affected along with social life. Scuer J et al reported that 21% of patients with mastalgia had an effect on sexual activities and 18% on sleep pattern20.
Carmichael AR et al observed 41% patients had an effect on sexual activities and 35% patients had their sleep affected.

Of the 15% of patients in our study who reported with severe mastalgia, 8 patients reported being married with no issue, 4 patients were widowed and 3 patients were having domestic problem. Most patients presenting with mastalgia are anxious about breast cancer especially young educated females, once their fear is dealt with education and counseling, it becomes easier to treat these patients.

Levels of anxiety, depression and social dysfunction which was seen in patients with severe mastalgia should be dealt with reassurance and counseling of both patient and male partner.

Conclusion
There is a lot more to do for patients with mastalgia, though treatment for mastalgia is not specified, it should be tailored according to the patients need. As mastalgia hampers patients quality of life, it is duty of the concerned doctor to spend their time with patients and treat the patient with compassion and care.

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