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ASSESSMENT OF SYMPTOMS IN PERIMENOPAUSAL FEMALES USING THE MODIFIED MENOPAUSE RATING SCALE (MRS)

Obstetrics & Gynaecology

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ABSTRACT

Background: Perimenopause is a transitional phase preceding menopause, characterized by hormonal fluctuations and multisystem symptoms that significantly affect quality of life. Symptom burden varies across populations, particularly in rural and underprivileged settings where awareness and healthcare access may be limited.**Objective:** To assess the severity of perimenopausal symptoms using the Modified Menopause Rating Scale (MRS) among women attending a tertiary care hospital in a remote setting.**Methods:** This observational longitudinal study was conducted over six months in the Departments of Physiology and Obstetrics and Gynaecology at a tertiary care hospital. Seventy women aged 40–55 years presenting with perimenopausal symptoms were enrolled after Institutional Ethical Committee approval and informed consent. The Modified Menopause Rating Scale, consisting of 11 items across somatic, psychological, and urogenital domains, was administered. Each symptom was graded on a 5-point Likert scale (0–4). Data were analyzed using descriptive statistics and expressed as percentages. **Results:** The highest symptom burden was observed in women aged 45–55 years, with peak severity around 50 years. In the somatic domain, 53.5% reported mild-to-moderate hot flushes and sweating, and 4.2% experienced severe symptoms. Joint and muscular discomfort was reported by 66.2%. Psychological symptoms were prominent, with 66.2% reporting depressive mood, 60.5% experiencing mild-to-moderate anxiety, and 45% reporting sleep disturbances (14.1% severe). Urogenital symptoms were less prevalent and predominantly mild, with bladder problems infrequently reported. **Conclusion:** Somatic and psychological symptoms predominate over urogenital complaints in perimenopausal women, particularly between 45–55 years. Routine screening using the MRS and targeted interventions such as lifestyle counselling, stress management, and hormone therapy evaluation are essential to improve quality of life.

KEYWORDS

INTRODUCTION

Perimenopause represents the period of endocrine, biological, and clinical changes preceding the final menstrual period (FMP). It begins with menstrual irregularities and continues until menopause is confirmed after 12 consecutive months of amenorrhea. This transition is typically divided into early and late phases, depending on cycle variability and duration of amenorrhea [1].In the current era, women are more likely to spend a significant portion of their lives during this phase of menopause due to the increased availability of health services. Although menopause is a normal physiological change, its symptoms can sometimes be so severe that they can interfere with day-to-day activities, and sadly, most women are unaware of certain menopausal changes[2].

Perimenopause is typically categorized into two phases namely early transition, where cycle variability increases but menstruation still occurs, and late transition, characterized by extended intervals of amenorrhea (≥60 days) before the FMP. Globally, menopause occurs between 45 and 55 years of age, with a mean age of 50–52 years. In developing countries such as India, menopause often occurs earlier, between 43 and 49 years [3].

Numerous published studies indicate differences in menopausal symptoms between Asian and Caucasian women, with Asian women experiencing fewer physical and psychological symptoms compared to their Western counterparts. [4]. Changes to the bone or cardiovascular system that result in osteoporosis have also been observed in certain postmenopausal women with long-term estrogen deprivation. It is often known that women's quality of life is impacted by menopausal symptoms [5,6].

Declining oestrogen levels during perimenopause contribute to vasomotor symptoms (hot flushes, night sweats), psychological disturbances (depression, anxiety, irritability), sleep disorders, fatigue, and urogenital symptoms such as vaginal dryness and bladder dysfunction. Decreased oestrogen levels during this period leads to symptoms, including vasomotor symptoms (VMS) like hot flushes, night sweats, mood disturbances, sleep disorders, generalized fatigue, urogenital issues like vaginal dryness and dyspareunia [7,8,9]. Approximately 80% of women report VMS during this transition, and symptom severity increases from early to late perimenopause Daily functioning and quality of life is affected, particularly in rural and underprivileged settings, where women remain unaware of these changes and implications. The Modified Menopause Rating Scale is a validated, self-administered tool widely used in clinical and epidemiological research to assess the severity of menopausal symptoms. It encompasses somatic, psychological, and urogenital subscales [10,11].

MATERIALS AND METHODS

This study was an Observational, longitudinal study conducted in Department of Physiology along with the Department of Obstetrics and Gynaecology at a tertiary care hospital in a remote setting. The study duration was of six months. The study population comprised of seventy females aged 40–55 years presenting with perimenopausal symptoms. And those willing to provide informed consent. Pregnant or lactating women and women with uncontrolled comorbidities (hypertension, diabetes mellitus, cardiovascular disease, malignancies) were excluded. Written informed consent was obtained from all the participants.

The Modified Menopause Rating Scale consists of 11 items divided into three domains. Each item was scored from 0 (none) to 4 (very severe). In the somatic domain, hot flushes/sweating, heart discomfort, sleep problems, joint and muscular discomfort were the symptoms included. While in the psychological domain, symptoms included were depressive mood, irritability, anxiety and mental exhaustion. Bladder dysfunction, vaginal dryness, were urogenital domain symptoms.

Statistical analysis

Data were entered into Microsoft Excel and analysed using descriptive statistics. Results were expressed as frequencies and percentages. Domain-wise severity was categorised based on predominant scoring patterns.

RESULTS

The majority of participants belonged to the 45–55-year age group. The highest overall MRS scores were observed around 50 years of age. Overall, the somatic domain severity was categorized as moderate. 53.5% reported mild-to-moderate hot flushes and sweating, 4.2% of patients experienced severe vasomotor symptoms while 66.2% reported joint and muscular discomfort psychological symptoms were also categorized as moderate in overall severity.45% experienced sleep disturbances, with 14.1% reporting severe sleep problems, 66.2% reported depressive mood. 60.5% experienced mild-to-moderate anxiety. Among urogenital symptoms, bladder problems were infrequently reported and mostly mild. The urogenital domain showed the lowest severity compared to somatic and psychological domains.

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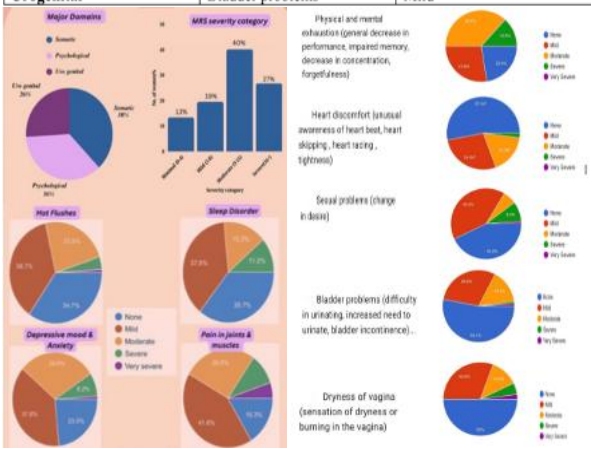
Domain	Symptoms Covered	Severity Category
Somatic	Hot flushes/sweating, heart discomfort, joint/muscular discomfort	Moderate
Psychological	Sleep problems, depressive mood	Moderate
Urogenital	Bladder problems	Mild



DISCUSSION

The present study underscores that the majority of participants experiencing menopausal symptoms belonged to the 45–55-year age group, with peak MRS scores observed around 50 years. This age distribution is consistent with literatures that identify the early 50s as the period of maximum symptom burden during the menopausal transition. Such findings reinforce the importance of targeted interventions for women in this age group[12].

Somatic symptoms were generally of moderate severity, with vasomotor complaints such as hot flushes and sweating being the most common. More than half of the participants reported mild-to-moderate vasomotor symptoms, while only 4.2% experienced severe manifestations.

Musculoskeletal discomfort was reported by 66.2% of participants, highlighting the substantial impact of somatic complaints on daily functioning and quality of life**.** These findings are consistent with existing literature attributing such symptoms to estrogen deficiency and neuroendocrine changes [13].

Psychological symptoms were also prominent, with 66.2% reporting depressive mood and 60.5% experiencing mild-to-moderate anxiety.Sleep disturbances were reported by nearly half of the cohort, with 14.1% experiencing severe problems. Sleep disruption has been widely recognised as a consequence of vasomotor instability and psychological distress, and our results support this interrelationship. This highlights the need for integrated mental health screening in menopausal clinics. Hormonal fluctuations, combined with psychosocial stressors, may contribute to mood disturbances and anxiety [14].

In contrast, urogenital symptoms were less frequently reported and generally mild, with bladder problems being the least severe among all domains. This pattern is consistent with studies that suggest urogenital complaints, though clinically significant, are often underreported compared to somatic and psychological symptoms. possibly due to sociocultural hesitancy in discussing sexual and urinary concerns. This underreporting underscores the importance of sensitive clinical inquiry [12].

The findings emphasize that the menopausal experience is multidimensional, with somatic and psychological domains exerting greater influence on overall symptom burden than urogenital complaints. These results highlight the need for comprehensive management strategies that address vasomotor and musculoskeletal symptoms while also prioritising psychological well-being. Future research should explore cultural and lifestyle factors that may modulate symptom severity and reporting, as well as interventions tailored to the most burdensome domains.

CONCLUSION

Perimenopausal women between 45–55 years exhibit the highest symptom burden, with peak severity around 50 years. Somatic and psychological symptoms predominate over urogenital complaints. Early identification through structured tools like the Modified MRS and the implementation of targeted interventions-including lifestyle modification, stress management, and evaluation of hormone therapy-are essential to enhance quality of life.

REFERENCES

1. Santoro N. Perimenopause: From Research to Practice. J Womens Health (Larchmt).2016;25(4):332-9.
2. Sengupta A. The emergence of the menopause in India. Climacteric. 2003;6(2):92-5.
3. Sireger MF. Perimenopausal and postmenopausal complains in Paramedics assessed by Menopause rating scale in Indonesia.IOSR-JDMS.2014;13:38-42.
4. Oddens BJ, Boulet MJ, Lehert P, Visser AP. Has the climacteric been medicalised? A study on the use of medication for climacteric complaints in four countries. Maturitas. 1992;15(December (3)):171–81.
5. Lee I, Wang HH. Pattern and related factors of self-care behavior among perimenopausal women. Public Health Q. 2001; 28:151–60.
6. Jong LF, Shun JW, Shiang RL, Kai DJ, Lung MC. The Kinmen women-health investigation (KIWI): a menopausal study of a population aged 40-54. Maturitas. 2001; 39:117–12.
7. Mustaq S. Post-menopausal women: a study of their psycho-physical changes with an impact on family. Anthropologist 2011;13(2):131–5.
8. Gallicchio L, Miller SR, Kiefer J, Greene T, Zacur HA, Flaws JA. Risk factors for hot flashes among women undergoing the menopausal transition: baseline results from the Midlife Women's Health Study. Menopause.2015; 22:1098–107.
9. Kim HK, Kangm SY, Chung YJ, Kim JH, Kim MR. The Recent Review of the Genitourinary Syndrome of Menopause. Journal of menopausal medicine.2015;21:65 –71.
10. Unni J. Third consensus meeting of Indian Menopause Society (2008): A summary. Midlife Health.2010;1(1):43-7.
11. Heinemann K, Ruebig A, Potthoff P, Schneider HP, Strelow F, Heinemann LA et al. The Menopause Rating Scale: A methodological review. Health Qual Life Outcomes 2,45 (2004).
12. Mediboina A., Pratyusha P, & Kumar G.S. Determining the Prevalence and Severity of Menopausal Symptoms in Post-Menopausal Women of Eluru, Andhra Pradesh, India, using the Menopause Rating Scale (MRS). International Journal of Medical Students 2024;12(2):152–160.
13. Singh A, Pradhan SK. Menopausal symptoms of postmenopausal women in a rural community of Delhi, India: A cross-sectional study. J Midlife Health. 2014;5(2):6.
14. Nayak T, Anand NI, Rada N, Methaniya H. International Journal of Pharmaceutical and Clinical Research 2024; 16(4); 682-686.