# Comparison of Menstrual Period Experiences in Mothers and Their Daughters

**Fatma Tuygar Okutucu**

*Ataturk University. Faculty of Medicine, Department of Psychiatry, Erzurum, Turkey*

**Abstract**

**Introduction:** Menstrual problems affected by mothers or learned from mothers may continue for a lifetime. Understanding these factors may enable symptoms to be controlled. We aimed to compare premenstrual symptoms of daughters with their mothers' previous premenstrual and menopausal complaints and thought it might be a useful contribution for managing menstrual periods.

**Materials and Methods:** Postmenopausal women who applied to gynecology and obstetrics policlinic and their menstruating adult daughters were clinically evaluated with psychiatrist clinician interview. Menopause rating scale(MRS) and premenstrual syndrome scale(PMSS) for previous were applied to mothers, and PMSS to daughters. Sociodemographic characteristics were also evaluated. Results were compared in SPSS 26.0 program.

**Results:** There were 55 mother-daughter couples participated in the study. The mean age of daughters was 25.54±6.4 years, of mothers was 55.23±8.31 years. Anxiety, depressive thoughts, sleep, bloating symptoms of PMSS in both groups were similar, however depressive mood, fatigue, appetite, pain symptoms were different. Anxiety and fatigue symptoms of daughters were positively correlated with psychological menopausal symptoms of mothers, however daughters' PMSS scores weren't correlated to mothers' somatic menopausal symptoms. Daughters' pain scores were correlated to mothers' urogenital menopausal symptoms.

**Conclusion:** Premenstrual symptoms of daughters were related to some of their mothers' previous premenstrual and current menopausal problems. The investigation of social relationship between PMS and menopause may play role in determining methods for managing menstruel periods. But long-term, large-populated prospective follow-up studies may provide more evidence.

**Keywords:** Premenstrual syndrome; menopausal symptoms; mothers and daughters

## Introduction

Premenstrual syndrome (PMS) is determined with somatic and psychological symptoms and affect the lives of women, during the luteal phase and resolves within a few days of the menstruation (1). PMS is a cyclical process manifested by physical, cognitive, emotional and behavioral changes. Many symptoms have been known to occur in PMS but the most frequently occurring symptoms include headache, fatigue, bloating, backache, breast tenderness, food cravings, anxiety, irritability, social withdrawal and depression. Physiological and psychological changes in PMS vary dramatically in severity between individuals (2). 80% of females experience mild symptoms of PMS, and 20% may have moderate to severe symptoms (3). The cause of PMS is not well known and research results refer to the multitude of the causes. Familial inheritance, the role of sex hormones, neurotransmitters and central nervous system, environmental factors, social learning, and lack of social and emotional support can affect the symptoms (4,5). In addition, about 3 out of 4 women experience some symptoms during menopause (6). The most common menopausal symptoms reported are; hot flashes, night sweats, fatigue, decreased libido, and mood changes such as depression, irritability, and emotional responsibility. Other possible complaints are; memory impairment, lack of concentration, insomnia, and musculoskeletal complaints (7). A majority of women experience premenstrual symptoms, menopausal symptoms, or both, and somatic and psychological symptoms of both situations show similarity (8). There are studies in the literature demonstrating that reproductive stages affect each other. Studies have shown links between premenstrual symptoms and perimenopausal symptoms (9,10). The main etiological factor may be a genetic predisposition, (11) but also family history of depression and PMDD (premenstrual dysphoric disorder) and social learning are also risk factors for PMDD (12). There are studies showing that PMS symptoms are affected by the mother's PMS symptoms and the information learned from the mother (13). Mothers influence their daughters' perceptions as they communicate personal

*Corresponding Author: Fatma Tuygar Okutucu, Department of Psychiatry, Ataturk University, Faculty of Medicine, Erzurum, 25240, Turkey, E-mail: fokutucu.tuygar@atauni.edu.tr Orcid: Fatma Tuygar Okutucu 0000-0001-7706-6751

experiences of reproductive stages (14). In some mother-daughter studies, the PMS frequency of daughters who stated that their mothers had premenstrual complaints was higher (15,16). Studies indicating that there are similarities between mothers and their daughters, especially in some subgroups of PMS symptoms, have also been identified (12). Identifying the factors affecting PMS and evaluating the women and their families require evaluation for developing treatment plans, education, and motivation of the individuals (17,18). For this purpose, we aimed to compare the PMS symptoms of daughters with their mothers' previous PMS and current menopausal complaints. There are few studies in the literature comparing daughters' PMS symptoms with their mothers' PMS symptoms and are with adolescents or young girls, and no study comparing older adult daughters' PMS symptoms with their mothers' PMS and menopausal symptoms has been found in line with our research. The possibility of the relationship between menopause and PMS/PMDD may be worth considering by researchers. This perspective may provide information about the social relationship between PMS and menopause, which may affect the development of coping methods and treatments. Given that information about menstruation is widely influenced by mothers, family, and social culture; understanding of these factors may enable the stress, anxiety, and other symptoms caused by these periods to be controlled and would be important in managing menstrual attitudes. In our study we aimed to compare the premenstrual symptoms of daughters with their mothers' previous premenstrual and current menopausal complaints and thought it might be a useful contribution for managing menstrual periods.

## Materials and Methods

**Study design:** Postmenopausal women who applied to the gynecology and obstetrics outpatient clinic of our hospital for 1 year between July 2021 and July 2022, and agreed to participate in the study were included for the mothers group and their menstruating adult daughters were asked for the study, and those who volunteered to participate were included for the daughters group. The study was conducted by a psychiatrist at the gynecology and obstetrics clinic of our hospital, in collaboration with gynecologists. Postmenopausal women who applied for menopausal complaints were interviewed by a psychiatrist and scales and forms were filled in by the patients and their daughters.

We reached 98 mother-daughter couples and invited them to participate in our study. 25 of them did not volunteer to participate in the study, 14 did not want to answer the questions about menopause or menstruation, and 11 did not want to spare time. 3 of the daughters were not included because of pregnancy. The data of 15 participants were excluded from the study because they contained incomplete information. So 55 mother-daughter couples have been included. Our study was designed as taking mother-daughter couples. Women who have not menstruated for at least 1 year were included for the mothers group. Mothers aged 75 and over years were excluded. Menstruating daughters aged between 18-45 were included. Those currently receiving hormone replacement therapy were excluded; any systemic drug use, systemic, or gynecological disease was not an exclusion criterion for either group. Surgical menopause was also not an exclusion criterion for mothers. For daughters, pregnant women were not included in the study. The previous psychiatric disease history of the cases included in the study had been evaluated according to the statement of the participant and confirming with the hospital records. The psychiatric complaints of the participants were evaluated by psychiatrist clinician interview, those with active psychiatric symptoms and those currently using psychotropic medication were not included in the study, however previous psychiatric diagnosis or psychotropic use were not exclusion criteria. The sample size of the study consisted of 55 postmenopausal mothers and their 55 menstruating daughters. Our sample size was based on a study conducted by Novaes et al. (19). It had reported that women who experienced premenstrual dysphoria are more likely to present with psychiatric symptoms at the time of menopause. Based on the use of the analysis of variance (ANOVA) statistical model, an alpha level of 0.05, a power of 95, and an ES of 0.45, a total of 110 (55 for per experimental group) subjects were needed to have sufficient power to detect the relation of daughters premenstrual symptoms and mothers premenstrual and menopausal symptoms. The sociodemographic information form prepared by the researcher was recorded via asking by the researcher and the Premenstrual Syndrome Scale (PMSS) for daughters and in relation to past periods for mothers and the Menopausal Rating Scale (MRS) were self-applied. The scales of illiterate participants were filled out via reading and asking

by the researcher. Sociodemographic characteristics of both groups and the relationship between daughters' PMS symptoms and mothers' past PMS symptoms and current menopausal symptoms were evaluated.

**Premenstrual syndrome scale (PMSS):** The scale which was developed by Gencdogan (20) based on DSM III and DSM IV-R in 2006 in order to measure the premenstrual symptoms and to determine the severity of the Premenstrual Syndrome and which was underwent validation and reliability studies is composed of 44 clauses of 5 point likert type. The Chronbach Alpha coefficient which was calculated in order to determine the internal consistency of the scale was found as 0.75. The scale has nine lower dimensions, namely depressive mood, fatigue, nervousness, depressive thoughts, pain, modifications of appetite, modifications of sleep and bloating. 'PMSS total score' is obtained by the total of the scores received from these lower dimensions. The lowest score that can be received from the scale is 44, the highest score is 220. High score indicates that the density of PMS symptoms is high. While evaluating PMSS results, it is decided whether PMS exists or does not exist according to the case where the total scores received and subscale scores that might be received exceed 50% of the highest score. For this reason, score averages 111 and above means that PMS exists. As set forth in the guideline at the beginning of the scale, the clause is marked after having been read in consideration of the grades on the right of the relevant clause based on the condition of arising "within the period one week ago from the menstruation". In scoring the scale, "None" option is deemed as 1 point, "Rarely" as 2 points, "Sometimes" as 3 points, "Often" as 4 points and "Continually" as 5 points.

**Menopause rating scale (MRS):** It was first published in 1992 by Schneider et al. (21) in German to measure the severity of menopausal symptoms and their impact on quality of life. Turkish validity and reliability study of the scale was conducted by Gurkan (22). Cronbach's alpha reliability coefficient was found to be 0.84. Cronbach's alpha value was found to be 0.65 for somatic symptoms, 0.79 for psychological symptoms and 0.72 for urogenital symptoms. In the Likert-type scale, which consists of a total of 11 items including menopausal complaints, for each item; 0: None, 1: Mild, 2: Moderate, 3: Severe, and 4: Very severe. The total score of the scale is calculated based on the scores given for each item. While the minimum score that can be taken from the scale is "0", the maximum score is "44". The increase in the total score obtained from the scale indicates the increase in the severity of the complaints, on the one hand, and on the other hand, it indicates that the quality of life is negatively affected. The 11-item scale including menopausal complaints consists of 3 sub-dimensions. Somatic complaints sub-dimension (items 1, 2, 3, and 11): -Hot flashes (sweating attacks), -Heart disorders (heart compression, misfire, palpitation sensation that you do not normally feel), -Sleep problems (difficulty in falling asleep). , not being able to sleep for a long time, waking up early), -Joint and muscle disorders (pain in the joints, rheumatic complaints) Psychological complaints sub-dimension (items 4, 5, 6, and 7): -State of malaise (feeling bad, sad, tearful, unwillingness), mood changes),-Nervousness (feeling of irritability, tension, and irritability), -Anxiety (inner restlessness, feeling of panic), -Physical and mental fatigue (decreased work done during the day, weakening in memory, difficulty concentrating, forgetfulness), Urogenital complaints sub-dimension (items 8, 9 and 10): -Sexual problems (changes in sexual desire, sexual intercourse and satisfaction), -Urinary problems (difficulty in urination, frequent urination, urinary incontinence), -In the vagina (in the chamber) board uk (dryness and burning sensation in the vagina, difficulty in sexual intercourse) (21).

**Sociodemographic data form:** It was prepared by the researcher on the basis of literature information, including women's age, marital status, educational status, employment status, smoking-alcohol use, number of pregnancies, gynecological history, systemic diseases, and drugs used, and psychiatric history.

**Ethical Approval:** All participants signed an informed consent form. The study protocol was accepted by the local ethical committee of Ataturk University Medical Faculty (2021-05/22).

**Statistical analysis:** Statistical analysis was performed using the SPSS 26.0 program. The chi-square test was performed for the appropriate categorical variables based on the number or order of the table. In intergroup comparisons for numeric measure values, variables were separated as parametric and nonparametric at a significance level of 0.05 using the Kolmogorov-Smirnov and Shapiro-Wilk tests before comparison. The comparison between groups for the parametric variables was performed using Student t test. For the nonparametric variables, the Mann-Whitney test was used. The numerical variables were provided as mean±standard deviation, and the categorical variables were provided as frequency and percentages, after the descriptive analysis was

carried out, in order to examine the socio-demographic characteristics of the participants. Statistical significance level was set at 0.05. Correlation analysis for variables with normal distribution was performed using the Pearson test. A Spearman correlation analysis was performed for variables that did not show a normal distribution.

## Results

55 mothers and 55 daughters were included in the study. The mean age of the daughters was 25.54±6.4 years, and the mean age of the mothers was 55.23±8.31 years. Among the daughters, the youngest was 18 and the oldest was 41 years old. Evaluating PMSS, a score above a cut-off point of 110 was accepted as having PMS. According to this, 22 (40%) of the daughters and 17(31%) of the mothers had PMS. Sociodemographic characteristics of the groups are illustrated on Table 1.

**Table 1:** Sociodemographic characteristics of the groups

| Sociodemographic characteristics | Daughters n = 55 | Mothers n = 55 | p |
|---|---|---|---|
| Age (mean±St. Dev.) | 25.54±6.4 | 55.23±8.31 | |
| Marital status | n (%) | n(%) | |
| -Married | 20 (36.4%) | 52 (94.6%) | 0.001 |
| - Single -Widowed-Divorced | 35 (63.6%) | 3 (5.4%) | |
| Education | | | |
| -Illiterate | 0 (0%) | 7 (12.5%) | |
| -Literate | 1 (1.8%) | 13 (23.2%) | 0.001 |
| -Primary education | 14 (25.5%) | 23 (42.9%) | |
| -High school and above | 40 (72.7%) | 12 (21.4%) | |
| Working status | | | |
| -Not working | 40 (72.7%) | 47 (85.7%) | |
| -Retired | 0 (0%) | 3 (5.4%) | 0.014 |
| -Working | 15 (27.3%) | 5 (8.9%) | |
| Cigarette-alcohol use | | | |
| -Yes | 11 (20%) | 6 (10.7%) | 0.187 |
| -No | 44 (80%) | 49 (89.3%) | |
| Number of pregnancies | | | |
| -0-2 | 48 (87.2%) | 9 (18%) | |
| -3-5 | 6 (10.9%) | 23 (41%) | 0.001 |
| -5 and above | 1 (1.8%) | 23 (41%) | |
| Gynecological disease | | | |
| -Yes | 7 (24.1%) | 22 (39.3%) | 0.033 |
| -No | 22 (75.9%) | 33 (60.7%) | |
| Systemic Disease | | | |
| -none | 50 (90.9%) | 13 (23.6%) | |
| -Diabetes mellitus (DM) | 1 (1.8%) | 4 (7.2%) | |
| -Hypertension (HT) | 0 (0%) | 14 (25.7%) | |
| -Diabetes | 0 (0%) | 4 (7.2%) | |
| mellitus+Hypertension | 1 (1.8%) | 1 (1.8%) | |
| -Rheumatism | 0 (0%) | 1 (1.8%) | 0.001 |
| -DM+Rheumatism | 0 (0%) | 1 (1.8%) | |
| -HT+DM+ Rheumatism | 0 (0%) | 0 (0%) | |
| -Reproductive organ cancer | 0 (0%) | 1 (1.8%) | |
| -Reproductive organ prolapse | 0 (0%) | 2 (3.6%) | |
| - Urinary incontinence | 3 (5.4%) | 14 (25.4%) | |
| -Other | | | |
| Systemic drug use | | | |
| -Yes | 7 (34.5%) | 40 (71.4%) | 0.001 |
| -No | 48 (65.5%) | 15 (28.6%) | |
| Psychiatric diagnosis | | | |
| -Yes | 5 (9.1%) | 9 (16.1%) | 0.252 |
| -No | 50 (89.9%) | 46 (83.9%) | |

**p:** Chi-square test scores

**Table 2:** Sub-scale scores of the groups

| Subscale total scores | Daughters (n = 55) | Mothers (n = 55) | p |
|---|---|---|---|
| PMSS depressive mood | 17.22±7.62 | 12.91±7.51 | **0.003 |
| PMSS anxiety | 12.51±5.82 | 11.48 ± 6.10 | 0.366 |
| PMSS fatigue | 15.67±6.35 | 12.95 ± 6.79 | *0.031 |
| PMSS depressive thoughts | 12.83±6.49 | 12.03 ± 6.96 | 0.532 |
| PMSS appetite | 7.38±3.46 | 5.63±3.62 | *0.010 |
| PMSS pain | 7.78±2.82 | 5.78 ± 3.33 | **0.001 |
| PMSS sleep | 6.49±3.28 | 5.46±3.32 | 0.104 |
| PMSS bloating | 8.40±3.35 | 7.23±3.96 | 0.096 |
| PMSS Total | 100.76±34.14 | 83.63±39.82 | *0.017 |
| PMSS psychological | 70.71±27.79 | 59.52±30.07 | *0.044 |
| PMSS physical | 45.73±14.09 | 37.05±17.72 | **0.005 |
| MRS somatic | | 7.00 ±3.39 | |
| MRS psychological | | 7.00 ±4.30 | |
| MRS urogenital | | 3.50 ± 3.05 | |
| MRS Total | | 16.00±9.06 | |

**p:** Student t- test scores, **PMSS:** Premenstrual Syndrome Scale, **MRS:** Menopause Rating Scale
*p <.05; **p <.01; ***p <.001.

Subscale scores were evaluated for both groups. Anxiety, depressive thoughts, sleep and bloating symptoms of mothers and daughters were similar but depressive mood, fatigue, appetite and pain symptoms were different according to PMSS sub-scales. Symptoms of depressive mood, depressive thoughts, anxiety, and irritability in PMSS were classified as psychological symptoms (PMSS-Psychological) and pain, appetite changes, fatigue, sleep changes, and bloating were classified as somatic symptoms (PMSS-Somatic). There were also significantly difference in total psychological and somatic scores of the groups. Results of sub-scale scores of the groups are illustrated in Table 2.. There was no correlation between the sociodemographic characteristics and sub-scale scores of the groups. Sub-scales of daughters' PMSS (DPMSS) were compared with subscales of mothers' PMSS (MPMSS) and MRS. According to these comparisons, depressive mood subscale of DPMSS was positively corralated with total MRS scores. The anxiety subscale of DPMSS was positively correlated with depressive mood, anxiety and total psychological scores of MPMSS and total scores of MRS. The fatigue subscale of DPMSS was positively correlated with nearly all subscales of MPMSS except the pain subscale, and positively correlated with psychological scores and total scores of MRS. Fatigue subscale of DPMSS was especially strongly correlated positively with total MPMSS. Daughters' depressive thoughts were positively correlated with mothers' depressive mood subscale of MPMSS. Daughters' pain complaints were positively correlated with mothers' menopausal urogenital problems. Sleep problems of daughters were positively correlated with anxiety, pain, bloating, and total scores of MPMSS and somatic complaints of MRS. Daughters' bloating was positively correlated with correlated with mothers' bloating. Total psychological symptoms of daughters were positively correlated with depressive mood, anxiety, total psychological scores and total scores of MPMSS and psychological complaints and total scores of MRS. Total somatic symptoms of daughters were correlated significantly positively with depressive thoughts, anxiety, pain, bloating, total psychological, total somatic scores and total scores of MPMSS and total scores of MRS. The correlations of Daughters' PMSS subscale scores with mothers' PMSS and MRS subscale scores are illustrated in Table 3.

**Table 3:** Correlation of Daughters' PMSS subscale scores with mothers' PMSS and MRS subscale scores

| Subscale total scores | | MPMSS depressive | MPMSS anxiety | MPMSS fatigue | MPMSS depressive thoughts | MPMSS pain | MPMSS bloating | MPMSS Total | MPMSS psychological | MPMSS physical | MRS psychological | MRS | MRS urogenital | MRS Total |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| DPMSS dep.mood | r | | | | | | | | | | | | | .300* |
| | p | | | | | | | | | | | | | .026 |
| DPMSS anxiety | r | .301* | .280* | | | | | | .277* | | .334* | | | .347** |
| | p | .025 | .038 | | | | | | .040 | | .013 | | | .009 |
| DPMSS fatigue | r | .328* | .342* | .270* | .327* | | .329* | .359** | .346** | .302* | .302* | | | .314* |
| | p | .015 | .011 | .046 | .015 | | .014 | .007 | .010 | .025 | .025 | | | .020 |
| DPMSS dep.thought | r | 292* | | | | | | | | | | | | |
| | p | .031 | | | | | | | | | | | | |
| DPMSS pain | r | | | | | | | | | | | | .307* | |
| | p | | | | | | | | | | | | .023 | |
| DPMSS sleep | r | | .292* | | | .287* | .382** | .302* | | .316* | | | | |
| | p | | .030 | | | .034 | .004 | .025 | | .019 | | | | |
| DPMSS bloating | r | | | | | | .360** | | | | | | | |
| | p | | | | | | .007 | | | | | | | |
| DPMSS Total | r | .301* | .322* | | | | .324* | .304* | .298* | | .318* | | | .331* |
| | p | .026 | .017 | | | | .016 | .024 | .027 | | .018 | | | .014 |
| DPMSS psychological | r | .305* | .282* | | | | | .272* | .284* | | .304* | | | .325* |
| | p | .023 | .037 | | | | | .045 | .036 | | .024 | | | .026 |
| DPMSS physical | r | | 317* | | 279* | 289* | 416** | 330* | 292* | 305 | | | | .273* |
| | p | | .018 | | .039 | .033 | .002 | .014 | .031 | .024 | | | | .044 |

r*: Pearson correlation is significnat at the 0.01 level, r**: Pearson correlation is significant at the 0.05 level, **DPMSS:** Daughters' Premenstrual Syndrome Scale **MPMSS:** Mothers' Premenstrual Syndrome Scale **MRS:** Menopause Rating Scale,

## Discussion

To our knowledge, this is the first study to investigate the adult daughters' PMS symptoms with their mothers' PMS and menopausal symptoms. We found that anxiety, depressive thoughts, sleep, bloating symptoms of PMSS were similar for mothers and daughters, however depressive mood, fatigue, appetite, pain symptoms were not. In a study evaluating knowledge and attitudes of mothers and daughters about menstruation, it was found that the attitudes of mothers and daughters were similar, but the symptoms complained of by mothers and daughters were significantly different from each other (23). Similarly, in our study, there were similar and different aspects of PMS symptoms between mothers and their daughters. This may be related to individuals highlighting and scoring higher the symptoms that have a greater impact on their lives. Some studies suggest that women whose mothers report PMS are more likely to develop PMS (70%, versus 37% of daughters of unaffected mothers) (24). Studies comparing daughters' PMS symptoms with their mothers' PMS symptoms have shown that daughters' PMS symptoms are related to mothers' PMS history (13,15). Presence of a family history of PMS is reported as the most important determinant for the development of PMS in some studies (25,26).

Our results were consistent with this literature in terms of similarities in symptoms. In a study that evaluated especially according to subscale scores, the subscale scores of mothers and daughters were found to be correlated, and it was mentioned that data on mother-daughter connection problems and complex relationships affected the results (27). In another study evaluating young girls' attitudes towards menstruation, it was shown that menstrual attitudes were strongly associated with symptom expectations, and having a mother with PMS as a primary source of information could be a factor in the genesis of PMS (13). The fact that daughters' anxiety symptoms of PMS were associated with premenstrual scores of mothers in our study may mean that presence of anxiety increases symptom expectations and affects their attitudes. It has been stated in previous studies that the attitudes of women who come from a certain culture, social, and family environment towards menstruation are affected by these factors (27). However, there are also studies that could not find a relationship between the PMS history of mothers and the prevalence of PMS in daughters (28). With respect to the relationship between daughters' PMS symptoms and mothers' menopausal symptoms, in our study, while anxiety and fatigue symptoms of daughters were positively correlated with psychological menopausal symptoms of mothers, any PMSS scores of daughters were not correlated to mothers' somatic menopausal symptoms. PMSS pain scores of daughters were corralated to urogenital menopausal symptoms of mothers. Various studies showing the relationship between premenstrual and perimenopausal problems are available (9,10). Various attempts have been made to identify risk factors associated with increased susceptibility to both periods. Social learning and lack of social and emotional support can affect the development and intensity of symptoms during these periods as well as biological factors (4) Previous studies that found an association between PMS symptoms of mothers and daughters were mostly in adolescents and young girls (13,25-27,29), but the mean age of the daughter population in our study was 25.54±6.4 years. The oldest daughter's age was 41. The fact that anxiety symtoms of daughters are also associated with the psychological symptoms of menopause, as in PMS, may give the idea that the mother's role in the anxiety symptoms of daughters and the effect on symptom expectation and PMS symptoms reported for adolescence and early adulthood, which are affected by mothers, may continue at later ages. However, the development of coping attitudes with age and exposure to different information sources may reduce this relationship. Investigations for the menopause symptoms that girls will experience in the future may be worth considering by researchers. The social relationship between PMS and menopause may play a role in determining methods that can influence expectations, self-awareness, coping methods and treatments that can be developed (30).Given that information about menstruation is widely influenced by mothers, family, and social culture; adequate knowledge and understanding of these factors may enable the stress, anxiety, and other symptoms caused by these periods to be controlled with different techniques, and is potentially important in managing menstrual attitudes.

**Strengths of the study:** It is the first study to compare the premenstrual symptoms of such older adult daughters with the previous premenstrual symptoms and specifically the menopausal symptoms of their mothers. There are few studies evaluating the sub-scale scores in particular. These are the strengths of our study.

**Study limitations:** Retrospective evaluation of premenstrual symptoms of mothers is one of the limitations of our study. However, we think that premenstrual symptoms can be easily remembered because they are very disturbing. The conduction of the study with a small size of population is another limitation. However, most of the previous studies were survey studies conducted with daughters only, while in our study, a psychiatrist-clinician interview was conducted with both mothers and daughters. Considering that it is difficult for mothers and adult daughters to be present at the outpatient clinic at the same time, different from mothers-adolescent daughters (adolescent girls may be required to come with their mothers because they are underage), it may be understood that it is difficult to obtain very large populations. But long-term and large-population multicenter prospective follow-up studies may provide more evidence.

## Conclusions

Premenstrual symptoms of daughters were related to their mothers' previous premenstrual and current menopausal problems. Information about menstruation seems to be widely influenced by mothers, family, and social culture, so adequate knowledge and understanding of these factors can enable the stress, anxiety, and other symptoms caused by these periods to be controlled with different techniques, and may be potentially important in managing menstrual attitudes.

However, long-term and prospective follow-up studies on larger populations may provide more evidence.

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