Psychological Distress and Anxiety among Housewives: The Mediational Role of Perceived Stress, Loneliness, and Housewife Burnout

M. Durak[1] · E. Senol-Durak[1] · S. Karakose[2]

Abstract

Housewives are experiencing chronic stress when dealing with multiple roles (cooking, shopping, tidying the house) in their daily life. Although earlier studies have documented a significant link between role overload and stress-psychological well-being in the workplace, few studies have been conducted among housewives despite their high anxiety and burnout reports. The diathesis-stress model and transactional model of stress indicate that there may be somecontributory factors related to mental health. Within these frameworks, this research aimed to examine housewives' psychological distress and anxiety by focusing on three contributory factors namely housewife burnout, perceived stress, and loneliness. The present study was a novel contribution to the literature investigating the mediating roles of those three contributory factors between psychological distress and anxiety among housewives. Participants were 500 volunteer housewives between the ages of 20 and 70 from Turkey. In addition to Demographic Information Form, The Perceived Stress Scales (PSS-10), The General Health Questionnaire (GHQ-12), The UCLA Loneliness Scale—Version 3 (UCLA LS3), The Housewives Burnout Questionnaire (CUBAC), and The Beck Anxiety Inventory (BAI) were used. Results showed that there were four paths between psychological distress and anxiety in the model, explaining 31.19% of the total variance in anxiety in housewives. The relationship between psychological distress and anxiety was mediated by perceived distress, loneliness, and housewife burnout. Specifically, the higher psychological distress and higher anxiety relationship were associated with higher perceived distress, higher loneliness, and higher housewife burnout. The findings provide beneficial insight for clinicians to prioritize the abandonment of the cope with loneliness, perceived stress, and burnout while working with housewives having psychological distress and anxiety.

Keywords Housewives · Burnout · Perceived stress · Loneliness · Psychological distress · Anxiety

Housewives experience a high level of stress. Studies have documented that household chores are one of the critical determinants of housewives' chronic stress. It is essential to examine the role of household chores on housewives' psychological distress (Brantley et al., 2005). Moreover, it is emphasized that women who do not work outside the home in paid employment have a greater risk of experiencing higher mental health problems (Haggett, 2009). For example, a large body of research demonstrated that employed women have higher psychological well-being as compared to housewives (e.g. Dadsetan et al., 2006; Sinha, 2017; Smadi, 2019). Whereas, housewives were reported higher levels of stress and burnout as compared to employed women (Fallahzadeh et al., 2014; Smadi, 2019). It has been also documented that housewives had lower quality of life (Saravi et al., 2012), lower life satisfaction, and higher stress (Panwar & Srivastava, 2019) than employed women. Therefore considering the multiple roles of women in the home as a chronic stressor and its relation to mental health, understanding these variables' relationship should be clarified for housewives. In addition to burnout and stress, housewives had a high prevalence of anxiety symptoms (Kaur et al., 2011; Lebert-Charron et al., 2021). A recent meta-analysis

✉ E. Senol-Durak
emresenoldurak@gmail.com

M. Durak
mithatdurak@gmail.com

S. Karakose
selin.karakose@isikun.edu.tr

[1] Department of Psychology, Bolu Abant Izzet Baysal University, Bolu, Turkey

[2] Department of Psychology, Isik University, Istanbul, Turkey

showed a significant link between burnout and anxiety (Koutsimani et al., 2019).

Based on these results, several different reasons why housewives are at risk in terms of mental health problems have been proposed. Housewives with traditional, domestic, and home care roles were mentioned to be as stressful (Sinha, 2017). Furthermore, employed women were more likely to seek support for housework as compared to housewives (Mo et al., 2020). Thus, being a housewife has been evaluated as a risk factor for poor mental health. Some of those mental health issues are burnout (Avargues-Navarro et al., 2020; Harilal & Santosh, 2017) and anxiety (Kaur et al., 2011; Lebert-Charron et al., 2021). For instance, in a comparison study examining the level of satisfaction among housewives versus employed women, housewives showed higher levels of anxiety than employed women (Kaur et al., 2011). In another study comparing anxiety levels among three groups (housewives, unemployed, and employed in paid job) housewives reported higher anxiety scores than the others (Díaz-Morales & Sánchez-Lopez, 2008).

Housewife Burnout

Burnout is a physical and emotional response that limits one's capacity to manage situations when people face emotional stress (Lubbadeh, 2020). Similarly, experiencing emotionally demanding situations during a long period causes a state of physical, emotional, and mental exhaustion which is defined as burnout syndrome (Leiter & Maslach, 2015). The syndrome exists in the face of occupational stress. Many studies have focused on work burnout (e.g.; Xu & Yang, 2018), the risk factor of burnout is listed with work-related variables, such as overload, working conditions, and job stress. A substantial body of literature has examined the kinds of burnout with women, such as couple burnout (Pines et al., 2011), parental burnout (Lebert-Charron et al., 2021; Mikolajczak et al., 2021; Mikolajczak & Roskam, 2020; Roskam et al., 2021; Wang et al., 2021), housewife burnout (Senol-Durak & Durak, 2020), and job burnout (Leiter & Maslach, 2015).

Job burnout ––physical, emotional, and mental exhaustion due to work tasks—has been well-established in literature unlike other burnout types women experience (Leiter & Maslach, 2015). Nonetheless, it has been suggested that burnout might not be limited only to people formally employed (Tavella et al., 2020). Some of the less known burnout types are parental burnout, the work overload experience of mothers due to parental roles for child care and feeling of detachment from children (Lebert-Charron et al., 2021; Mikolajczak et al., 2021); and couple burnout, exhaustion due to caring for kids and the older generation when both spouses are working (Pines et al.,

2011). Even though different types of burnout appear to be a popular topic currently, burnout of housewives remained understudied despite the fact that housewife burnout is considered to be an important predictor of emotional disorders (Avargues-Navarro et al., 2020) and health problems (Smadi, 2019). Aforementioned burnout definitions, burnout among housewives is not solely about s parenting issues. Therefore, different terms are operationalized for burnout concepts. Burnout in housewives assumes that burnout increases as a result of the experience related to multiple roles such as being a wife, mother, and homemaker (Harilal & Santosh, 2017; Taylor, 2009). Therefore burnout among housewives is assessed with the overload of household chores, tiredness from house chores, feeling of unpleasantness and boredom about home duties (Ramirez et al., 2009).

Women who handled the multiple roles and had emotional, physical, and mental exhaustion as housewives are one of the vulnerable populations to suffering chronic stress. Housewives devote most of the day to complete housework (Díaz-Morales & Sánchez-Lopez, 2008; Kaplan, 2021). That housework is cleaning, cooking, gardening, ironing, shopping, and tidying the house (Hendry, 2017) as well as considering the welfare of the family and home bounding (Goldstein-Gidoni, 2018). It has been reported that 40% of housewives prefer a part-time job, while 28% prefer a full-time job rather than just being a housewife (VerBruggen & Wang, 2019). Housewives are experiencing chronic stress when dealing with several problems in their daily life. They hold multiple roles such as being a wife, mother, and homemaker. These multiple roles lead to experience role overload that increases stress and burnout as a result (Harilal & Santosh, 2017; Taylor, 2009).

Although earlier studies showed significant relationship between role overload, stress, and psychological well-being in the workplace (Ahola & Hakanen, 2007; Armon et al., 2014), only a few studies investigating burnout among housewives have been conducted(e.g., Avargues-Navarro et al., 2020; Norberg, 2007; Wang, 2013; VerBruggen & Wang, 2019). Unlike the well-established literature investigating the association between burnout and stress among employed people (e.g., police officers, therapists, nurses) (Burke, 1994; Burke et al., 2009; D'souza et al., 2011), housewives' burnout due to the house chores is not yet documented. Even though being a housewife is not categorized as an occupation (with its unpaid situation, Bergmann, 2005), housewives should be investigated in terms of mental health (Smadi, 2019) since their life is including work overload by especially daily chores. Consistent with the literature, this study aimed to investigatethe role of perceived stress, perceived distress on housewife burnout and anxiety.

Theories of Mental Health and Contributory Factors

The contributory factors to housewives' anxiety and burnout are many and varied. This research examined three of these contributory factors that are psychological distress, perceived stress, and loneliness considering the diathesis-stress model. The model assumes that recent or earlier life difficulties contribute to mental disorder when combined with stressors (Monroe & Simons, 1991). Geuens et al. (2015) emphasized that the greater diathesis or vulnerability is closely associated with the fewer stressors on the triggering process of burnout. In other words, for the people who have a lower resilience capacity of stress, only a few stressors trigger burnout syndrome. The diathesis-stress model also focuses on how the environment impacts people and how people influence their surroundings. As conceptualized within the model, stressors -circumstances producing stress- (Carson et al., 2000; Lazarus, 2006) also influence the risk of mental and physical health problems (Monroe & Simons, 1991).

Apart from the diathesis-stress model, the transactional model of stress assumes that perceived stress is crucial for mental health outcomes (Lazarus & Folkman, 1984). Individuals who evaluated perceived stress more are affected more negatively. Also, personality factors (Tavella et al., 2020), and perceived stress (Mourad et al., 2008) are accepted as key determinants influencing mental health outcomes within the diathesis-stress framework. For example one of the personality traits – loneliness – along with higher perceived stress contributes to burnout and anxiety (Durak & Senol-Durak, 2010). Moreover, psychological distress is highlighted to be associated with burnout and anxiety that the more people have psychological distress the more they have feelings of burnout and anxiety (Lopes Cardozo et al., 2012; Sánchez-Moreno et al., 2014). To our knowledge, no studies have been investigated the indirect effects of three contributory factors (stress, burnout, loneliness) on the link between psychological distress and anxiety among housewives. Nevertheless, considering diathesis-stress processes, there has been an expanding accentuation on perceived distress and personality factors wherein people add to the event of stressors in their lives.

Psychological distress is one of the contributory factors of burnout and anxiety. However, there is a paucity of research examining relations between psychological distress and burnout or anxiety among housewives. There are some studies conducted with women consistently reported to be more distressed than men (Ferraro & Nuriddin, 2006; McDonough & Strohschein, 2003). For instance, a relationship between higher psychological distress and higher anxiety levels is observed among postpartum mothers (Bener, 2013). However, the role of psychological distress on burnout and anxiety among housewives has not been examined yet.

Perceived stress is another contributory factor to housewives' anxiety and burnout. It is related to mental conditions and is defined as a perception of the stressfulness of an event independent of its objective characteristics (Taylor, 2009). It is also seen as a significant risk factor for poor mental health (Kwag et al., 2011). Higher perceived distress is found to be associated with higher burnout and anxiety (Lopes Cardozo et al., 2012). Also, there are several studies comparing housewives and employed women in terms of perceived distress. However, mixed results are seen in the literature that employed women are reported to have better psychological well-being than housewives while they are reported to have higher perceived distress than housewives (Priya & Ahmad, 2021).

Another contributory factor of housewives' anxiety and burnout is loneliness. Researchers have found that housewives have severe feeling of loneliness (Andersson, 1990) and depressive symptoms as a consequence of loneliness (Cacioppo et al., 2006) in both cross-sectional (Chou & Chi, 2004; Nolen-Hoeksema & Ahrens, 2002), and longitudinal studies (Heikkinen & Kauppinen, 2004). Research has demonstrated that both acute and chronic stress are associated with loneliness (Mushtaq et al., 2014), although the direction of loneliness and stress is disputed. Also, it is known that satisfying social relationships are essential for mental health (Durak & Senol-Durak, 2010). Therefore, loneliness is associated with various mental health problems such as burnout and anxiety. Housewives reported experiencing higher burnout and loneliness when they have detrimental relationships with their spouse and children(Kaplan, 2021). Even though studies addressing loneliness have increased dramatically over the past twenty years among housewives, there is a paucity of studies about the factors associated with loneliness and its relation to stress, anxiety, and burnout.

Consistent with the diathesis-stress model, studies documented that personality factors and perceived stress mediate the link between housewives' overall psychological wellbeing and mental health outcomes. When examining the role of burnout and anxiety relationships in a meta-analysis, Koutsimani et al. (2019) found a link between burnout and anxiety Specifically, they showed that exhaustion, cynicism, and lack of professional efficacy which were indicators of burnout predictedanxiety involving cognitive, somatic, emotional, and behavioral indicators (Koutsimani et al., 2019). Likewise, another study reported that burnout triggers higher anxiety (Ding et al., 2014). Moreover,, higher burnout was associated with higher anxiety among nurses (Mark & Smith, 2012), and the mediating role of burnout in between occupational stress and anxiety among community
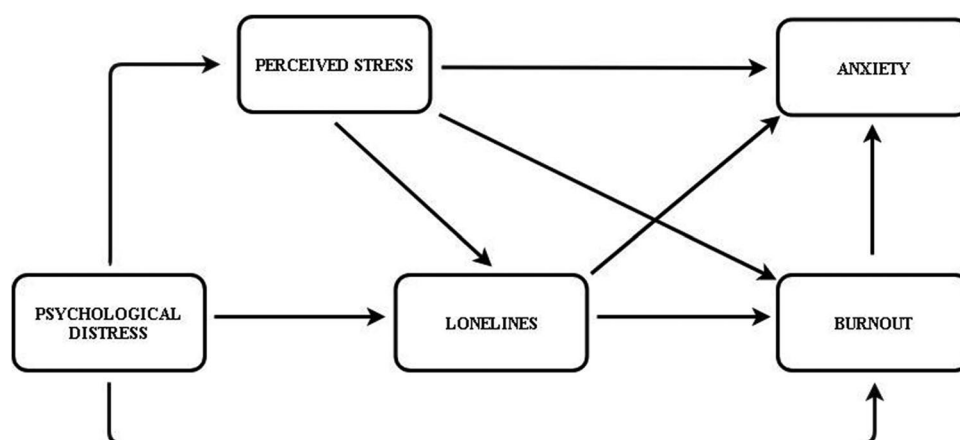
healthcare workers (Ding et al., 2014) showed that anxiety is the outcome of burnout variables.

Based on contributory factors of psychological distress, perceived stress, and loneliness and direction of the relationships aforementioned before, the present study aimed to examine relations between psychological distress, perceived stress, and loneliness on anxiety and burnout in the sample of housewives (Fig. 1). We also aimed to investigate the mediating roles of perceived stress, loneliness, and housewife burnout in between perceived distress and anxiety..

Hypothetical Model

The mediating roles of perceived stress, loneliness, and burnout between psychological distress and anxiety was proposed based on the diathesis-stress model and transactional model among housewives.

Hypotheses of the present study

In terms of the direct and indirect effects on the hypothetical model tested by Structural Equation Modeling, seven hypotheses are established.

> **Hypothesis-1:** Higher perceived stress is directly associated with higher psychological distress (H_{1a}).
> **Hypothesis-2:** Higher loneliness is directly associated with higher psychological distress (H_{2a}) and perceived stress (H_{2b}).
> **Hypothesis-3:** Higher burnout is directly associated with higher psychological distress (H_{3a}), perceived stress (H_{3b}), and loneliness (H_{3c}).
> **Hypothesis-4:** Higher anxiety is directly associated with higher perceived stress (H_{4a}), loneliness (H_{4b}), and burnout (H_{4c}).

> **Hypothesis-5:** Perceived stress serves as an intervening variable between psychological distress and loneliness (H_{5a}), psychological distress and burnout (H_{5b}), and psychological distress and anxiety (H_{5c}).
> **Hypothesis-6:** Loneliness serves as an intervening variable between psychological distress and burnout (H_{6a}), psychological distress and anxiety (H_{6b}), perceived stress and burnout (H_{6c}), and perceived stress and anxiety (H_{6d}).
> **Hypothesis-7:** Burnout serves as an intervening variable between psychological distress and anxiety (H_{7a}), perceived stress and anxiety (H_{7b}), and loneliness and anxiety (H_{7c}).

Method

Participants

Participants were 500 volunteer women between the ages of 20 and 70 from Turkey (M = 40.05, SD = 10.93). Regarding marital status, 7% (n = 35) were single, 3% (n = 16) were divorce/separate, 5% (n = 23) were widow and 85% (n = 426) were married. For the education level of participants, 44% (n = 222) were graduated from primary school, 14% (n = 68) were graduated from secondary school, 30% (n = 152) were graduated from high school, and the other 12% (n = 58) were university graduates. The mean of monthly family income was 2122 Turkish Lira[1] (SD = 1474), ranging from 500 to 14,400.

The mean number of children is 2.08 (SD = 1.32, Range = 0–8 children). The mean of the participants' report about the spending time for house chores 3,57 h daily (SD = 2.0). The majority of the participants 47,40% (N = 237) reported that no one helps them with the house chores, whereas 43.00% (N = 215) receive support from at

---

[1] 1 TL (Turkish Lira) = .13 USD.

least one person in their household (Their husband, children, parents, etc.). The percentage of participants who reported receiving support from two or more people was 9.60% (N = 48). Being illiterate and literate, currently having psychological/psychiatric treatment or the use of psychotherapeutic medication were the exclusion criterion of the study. The inclusion criterion was being above 18 and volunteer.

Measures

The Demographic Information Form: It was administered to participants to gather information about age, marital status, education level, and monthly income, etc.

The Perceived Stress Scales (PSS-10): The Perceived Stress Scale (PSS) is a 14 items scale that was developed (Cohen et al., 1983) to assess perceived stress like the feelings and thoughts of one's life as uncontrollable, unpredictable, and overloaded over the last month with a five-point Likert (0: never, 4: very often) (e.g. "In the last month, how often have you felt that things were going your way?"). Scores on the PSS can range from 0 to 56 and higher scores indicate higher perceived stress. The scale was adapted to Turkish by Eskin and his colleagues (Eskin et al., 2013). During the adaptation to Turkish, the psychometric properties of the short-form of the 10-item and the 4-item scale, as well as the 14-item total scale, were tested. The internal consistency coefficients of the 14-item, 10-item, and 4-item forms of the scale were 0.84, 0.82, and 0.66; and test–retest reliability coefficients measured at one-month intervals were 0.87, 0.88, and 0.72, respectively. In this study, a ten-item short form of the scale was used. The internal consistency reliability of the scale in this study was found as 0.81, and the corrected item-total correlations ranged between 0.23 and 0.55.

The General Health Questionnaire (GHQ-12): General Health Questionnaire (GHQ-12) was developed by Goldberg and Williams (1988) to assess the presence of psychological distress. The scale consisted of 12 items with a four-point Likert type from 0 to 3. The score ranges from 0 to 3 (e.g. "losing confidence", "thinking of self as worthless"). The scores obtained from the twelve items ranged from 0 to 36, and high scores indicate a high level of psychological distress. The GHQ-12 was adapted to Turkish by Kilic et al. (1997). The internal consistency, sensitivity, and specificity of the scale were 0.87, 0.74, and 0.84, respectively. The internal consistency reliability of the scale in this study was found as 0.85, and the corrected item-total correlations ranged between 0.41 and 0.64.

The UCLA Loneliness Scale—Version 3 (UCLA LS3): The UCLA Loneliness Scale (UCLA) was developed by Russell (1996) to evaluate how often the individual feels socially isolated and suffers from subjective loneliness the scale consisted of twenty-one items in a four-point

Likert type ranging from "never" (1) to "always" (4) and two subscales. Eleven items included negative expressions, and nine items included positive expressions (e.g. "How often do you feel that you are 'in tune with the people around you?").. Internal consistency coefficients of the scale ranged from 0.89 to 0.94 and test–retest reliability was satisfactory over one year. The concurrent and discriminant validity results showed that the scale was well-established. The scale was adapted to Turkish by Durak and Senol-Durak (2010). The internal consistency coefficient ranged from 0.84 to 0.90, the one-, two- and three-factor structure was confirmed by confirmatory factor analysis, and the concurrent, criterion-related, and discriminant validity results were satisfactory. The internal consistency reliability of the scale in this study was found as 0.88, and the corrected item-total correlations ranged between 0.35 and 0.59.

The Housewives Burnout Questionnaire (CUBAC): The Housewives Burnout Questionnaire (CUBAC) was adapted from the Burnout Belief Questionnaire (BBQ) by Ramirez et al., (2009) to measure the burnout in housewives specifically. CUBAC consisted of 20 items with a five-point Likert type scale (1 = never to 5 = most of the time) with three subscales; risky or precursory characteristics, syndrome, and syndrome consequences. The tool includes dimensions fitting to the nature of housework: "Excessive workload in housework", "tired of housework", "feeling depressed", "boredom of work", "fatigue", "feeling worthless", "others not helping with household chores", "feeling unable to focus or concentrate on tasks", and "experiencing conflict in relationships with family members about household chores". The concurrent validity results are satisfactory. The correlation between the scale and The State-Trait Anger Expression Inventory was significant (r = 0.38). CUBAC was adopted into Turkish by Senol-Durak and Durak (2020). The Turkish adaptation version of the scale consisted of two subscales and the internal consistency reliability of the scale was found as 0.86, and the corrected item-total correlations ranged between 0.25 and 0.61.

The Beck Anxiety Inventory (BAI): Beck Anxiety Inventory (BAI) was developed by Beck and his colleagues to measure the severity of anxiety (Beck et al., 1988). BAI is a 21 self-report scale of four Likert types ranging from 0 (not at all) to 3 (severely-it bothered me a lot) (e.g. "How often do you feel dizziness in the past week?" and "How often do you feel nervous in the past week?"). The Cronbach alpha of the scale was found 0.92 and test–retest reliability was 0.75. The Turkish version of the BAI was adapted by Ulusoy et al. (1998), and Cronbach's alpha of the scale was found 0.93. The internal consistency reliability of the scale in this study was found as 0.92, and the corrected item-total correlations ranged between 0.43 and 0.69.

Procedure

The ethical approval was obtained from The Applied Ethics Research Center of Bolu Abant Izzet Baysal University. For the recruitment process of the study, an announcement was shared via students and social network sites.

The paper-and-pencil technique was used instead of an online application to prevent distractions due to work intensity and to fill the questionnaires in the most convenient and calm time.

Results

Comparison of Sample Characteristics with Population Statistics

Before the main analysis, the sample characteristics with population statistics according to the 2019 Statistics of Turkish Statistical Institute (TurkStat, 2019) were compared. According to the TurkStat Address Based Population Registration System (TurkStat, 2019), 33% of Turkey's population has consisted of women aged 20–70 years in 2019. Leaving out the women not having a formal education, approximately 32% were graduated from primary school, 24% were graduated from secondary school, 22% were graduated from high school, and 22% were university graduates. The marital status of Turkish women between the ages of 20 and 70, were 16% single, 5% divorced/separate, 10% widow, and 69% married (TurkStat, 2019).

Based on a chi-square test of goodness of fit, our sample's distribution of marital status ($\chi^2(3) = 16.12$, $p = 0.001$) and educational level ($\chi^2(3) = 12.07$, $p = 0.007$) did not match with the population's. According to the results of the chi-square test, the primary or high school graduation rate is higher than expected, secondary school and the university graduation rate is lower than expected. On the other hand, the rate of married housewives is higher than expected, and the rate of single and widowed housewives is lower than expected.

Preliminary Data analysis

Descriptive statistics and correlational analyses were performed by using the Statistical Package for Social Science (SPSS-25) released in 2017 (IBM, Armonk, NY, USA). The mediator role of loneliness and burnout between psychological distress or perceived stress and anxiety was examined with the Structural Equation Model by using AMOS-24 software (Arbuckle, 2016). The threshold for the p-value used to determine significance was established at 0.05.

The outliers in the data may be erroneous or random variations in the data (Tabachnick & Fidell, 2013). Since all data

is checked before data cleaning, the extreme values in the data refer to random variations, not errors. For the detection of potential multivariate outliers in the large samples, the rule stating that the threshold value for Mahalanobis D^2/df ratio should be four and more was applied (Hair et al., 2014). All six multivariate outliers were deleted ($D^2 \geq 20.515$, df = 5 and p ≤ 0.001) leaving 494 cases for analysis. Singularity or multicollinearity was tested by calculating Variance Inflation Factor (VIF), Tolerance (TOL), and Condition Indices (CI) in simple linear regression analysis in which psychological distress, perceived stress, loneliness, and burnout were entered into the equation as the independent variables and anxiety as the dependent variable. Singularity or multicollinearity was not found to be a problem for this data because the calculated VIF values were less than 4 (ranged from 1.55 to 2.01), the TOL values were higher than 0.25 (ranged from 0.50 to 0.65), and the CI values were lower than 15 (ranged from 1.00 to 14.74).

Checking for Common Method Variance (CMV)

In studies involving self-report measures, potential common method variance (CMV) poses a problem for the validity of the results due to the nature of the administration style. Procedural and statistical remedies suggested by several studies (Chang et al., 2010; Krishnaveni & Deepa, 2013; MacKenzie & Podsakoff, 2012; Soontornthum et al., 2020; Williams et al., 2010) were used to test CMV during the research design and analysis phases.

First, full anonymity is guaranteed by procedural remedies: (1) informing participants about the aim of the study, the voluntary participation, the privacy, and the consent, (2) using instructions for each questionnaire stating that there were no right or wrong answers, (3) using a paper-and-pencil questionnaire format instead of face-to-face interviews.

Also, eliminating ambiguities were applied for procedural remedies: (1) not using technical terms and leading questions in the research survey, (2) choosing measures with proven reliability and validity to measure research constructs, (3) using scales with reverse-scored items and different numbers of scale points (e.g., a three-point scale for BAI with "not at all" (0) to "severely-it bothered me a lot" (3), and a five-point scale for PSS-10 with "never" (0) to "very often" (4), (4) counterbalancing the order of questions.

Second, statistical remedies were applied by Harman's single factor test and marker variable method. To check for the possibility of the emergence of a single factor, Harman's single-factor test was performed (Krishnaveni & Deepa, 2013; Podsakoff et al., 2003) with an unrotated factor solution. The result demonstrates that a single factor does not explain the majority of the variance, it is lesser than %50 total variance, it explains only % 18.77 of the total variance. Furthermore, in line with the suggestion of MacKenzie and

Table 1 Correlations between variables and descriptive values of the variable

	X	SD	Minimum	Maximum
1. Number of residents at home (including self)	3.92	1.46	1	15
2. Number of years of housework	22.34	12.43	1	55
3. Daily hours allocated to household chores	3.59	2.01	1	10
4. Number of residents helping with household chores	.65	.72	0	3
5. Satisfaction with life at home	5.33	2.85	0	10
6. Perceived health status	4.52	.98	1	7

$^{***}p \leq .001, ^{**}p \leq .01, ^{*}p \leq .05$

Podsakoff (2012) that Harman's one-factor analysis alone is not sufficient to detect CMV, the common latent factor (CLF) method with a marker variable technique was used to detect CMV biases (Williams et al., 2010). A Common method bias (CMB) was tested by James Gaskin's specific bias test plugin (Gaskin, 2017, 2021) in AMOS-24 software (Arbuckle, 2016). Confirmatory Factor Analysis (CFA) marker technique was performed. "Emotional processing" developed in research from Stanton et al., (2000; adopted the scale into Turkish culture by Durak & Senol-Durak, 2011) was chosen as a marker variable from the same database due to being a theoretically unrelated variable to the theoretical model (Lindell & Whitney, 2001).

A Confirmatory Factor Analysis (CFA), in which all variables in the model and one marker variable were covariate, was performed with common latent factor (CLF). The constrained and unconstrained models are "invariant", not detecting any specific response bias affecting the model ($\chi^2(59) = 6740.00$ for unconstrained model; $\chi^2(977) = 7498.00$ for zero constrained model; $\Delta\chi^2(918) = 758.00$, p = 1.000).

Also, the unconstrained model in which the marker variable (emotional processing) was treated as the common latent factor was tested. The constrained and unconstrained models are "invariant", not detecting any specific response bias affecting the model ($\chi^2(60) = 7261.00$ for unconstrained model; $\chi^2(766) = 7619.00$ for zero constrained model; $\Delta\chi^2(706) = 358.00$, p = 1.000).

Descriptive Statistics and Correlations Between Variables

Descriptives and correlations of personal variables and household chores variables (number of residents at home, number of years of housework, daily hours allocated to household chores, number of residents helping with household chores, satisfaction with life at home) were presented in Table 1 with their descriptive statistics.

The correlational analysis pointed out that Burnout scores were closely related to psychological distress, perceived stress, loneliness, and anxiety (Table 2). It was positively associated with psychological distress (r = 0.60,

p < 0.001), perceived stress (r = 0.48, p < 0.001), loneliness (r = 0.49, p < 0.001) and anxiety (r = 0.37, p < 0.001).

The correlational analysis pointed out that Anxiety (BAI) scores were closely related to psychological distress, perceived stress, loneliness, and burnout. It was positively associated with psychological distress (r = 0.30, p < 0.001), perceived stress (r = 0.37, p < 0.001), loneliness (r = 0.27, p < 0.001), and burnout (r = 0.37, p < 0.001).

Also, the correlational analysis pointed out that psychological distress was closely related to perceived stress and loneliness. It was positively associated with perceived stress (r = 0.61, p < 0.001) and loneliness (r = 0.49, p < 0.001).
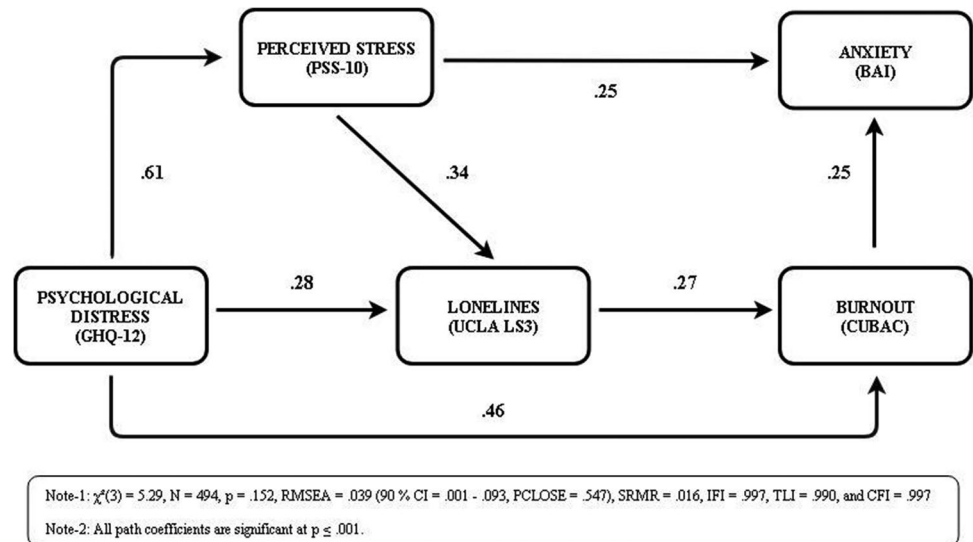
Model Testing

For checking the erroneous effects of multivariate outliers on the model, the hypothetical model examining predictors of anxiety in housewives was tested twice. Several indexes (Hu & Bentler, 1999; Kline, 2021) were tested to assess the model fit such as Tucker-Lewis Index (TLI), Comparative Fit Index (CFI), Incremental Fit Indices (IFI), p of Close Fit (PCLOSE), Root Mean Square Error of Approximation (RMSEA), Chi-Square (χ^2), and Standardized Root Mean Square Residual (SRMR). In respect to fit indices above 0.90 (ie., IFI, TLI, CFI; Hu & Bentler, 1999), PCLOSE (above 0.05; Hu & Bentler, 1999), RMSEA, and SRMR (which is

Table 2 Correlations and Descriptive statistics

	1	2	3	4	5
1. Psychological Distress (GHQ-12)		.61***	.49***	.60***	.30***
2. Perceived Stress (PSS-10)			.51***	.48***	.37***
3. Loneliness (UCLA LS3)				.49***	.27***
4. Burnout (CUBAC)					.37***
5. Anxiety(BAI)					
X	11.03	19.18	40.00	52.41	16.33
SD	5.94	6.53	9.64	13.46	11.85
Min. (Possible)	0	0	20	21	0
Max. (Possible)	36	40	80	105	63

$^{***}p \leq .001, ^{**}p \leq .01, ^{*}p \leq .05$

Fig. 2 The mediator roles of loneliness and burnout between psychological distress and anxiety a model was proposed based on the diathesis-stress model among housewives

Note-1: $\chi^2(3)$ = 5.29, N = 494, p = .152, RMSEA = .039 (90 % CI = .001 - .093, PCLOSE = .547), SRMR = .016, IFI = .997, TLI = .990, and CFI = .997

Note-2: All path coefficients are significant at p ≤ .001.

a sensitive measure of the model) between 0 and 0.05 are accepted to the better fit of a model (Schermelleh-Engel & Moosbrugger, 2003).

The first saturated structural model was tested including the exogenous variable and all endogenous variables. The chi-square value for the overall model was $\chi^2(1) = 0.01$ with p = 0.931, RMSEA = 0.001, and CFI = 1.000, highlighting poor fit between the hypothesized model and model data. Two insignificant paths on the saturated structural model were removed: (loneliness → anxiety (H_{4b}) (indirectly H_{6d} not accepted) [RE = 0.028, p = 0.570] and perceived stress → burnout (H_{3b}) (indirectly H_{5b} and H_{7b} not accepted) [RE = 0.089, p = 0.057]). Therefore, the model modifications were performed based on removing insignificant paths to develop a better fitting model. The model was significant and the fit indexes were further developed with eliminating of these two paths; $\chi^2(3) = 5.29$, n = 494, p = 0.152, RMSEA = 0.039 (90% CI = 0.001—0.093, PCLOSE = 0.547), SRMR = 0.016, IFI = 0.997, TLI = 0.990, and CFI = 0.997 (Fig. 2). There were four paths between psychological distress and anxiety in the model. All path coefficients were significant at p ≤ 0.001. Of the total variance, 11.76% was explained by the first path (psychological distress → burnout → anxiety) (H_{3a} H_{7a}), 1.89% by the second path (psychological distress → loneliness → burnout → anxiety) ($H_{2a}H_{3c}$ H_{6a} H_{6b} H_{7c}), 1.44% by the third path (psychological distress → perceived stress → loneliness → burnout → anxiety) (H_{1a} H_{2b} H_{4c} H_{5a} H_{6c} H_{7c}), and 15.12% by the fourth path (psychological distress → perceived stress → anxiety)(H_{5c} H_{4a}). Those four paths explained 31.19% of the total variance on anxiety in housewives.,

Besides, the model was tested for adequate fit when the multivariate outliers were not removed. In the analysis carried out by adding six multivariate outliers, the model again showed an adequate fit to the data, $\chi^2(3) = 7.90$, n = 500,

p = 0.048, RMSEA = 0.057 (90% CI = 0.005—0.108, PCLOSE = 0.331), SRMR = 0.021, IFI = 0.993, TLI = 0.978, and CFI = 0.993. Thus, the model fit was found not to be influenced by erroneous effects.

Discussion

The present study is conducted to see possible relations between psychological distress, perceived stress, loneliness, burnout, and anxiety in the sample of housewives within the diathesis-stress model. Although housewives work under a heavy workload and high stress without resting, there is no comprehensive study in the literature that explains housewife burnout and anxiety with structural equation modeling to explore complicated relations between those variables. Explaining the stress and psychological distress of housewives together, the model will be useful in explaining the emotional, personal, and cognitive processes of housewives. Current research, therefore, aims to introduce modeling that explains psychological distress, anxiety, and associated variables. The diathesis-stress model assumes that recent vulnerable difficulties in life contribute to disorder when combined with stressors (Monroe & Simons, 1991). Also, the role of perceived distress in revealing mental health outcomes has been mentioned in the transactional model of stress (Lazarus & Folkman, 1984, pp. 1–3). This study, it is investigated whether the direct causal relationship between psychological distress and anxiety in housewives can be explained and clarified better by revealing three mediator variables (i.e., perceived stress, loneliness, and burnout) in the inclusion of mediator variables.

Higher perceived stress is directly associated with higher psychological distress. This relationship is also assumed by the transactional model of stress (Lazarus & Folkman, 1984)

as well as in empirical studies (Mourad et al., 2008). In the current study it has shown that evaluation of the stressfulness of events is crucial to have high distress. Second, higher loneliness is directly associated with higher psychological distress and perceived stress, as expected. Results are relevant to the literature that the lonelier the housewives the more feelings of distress and stress occur (Mushtaq et al., 2014). Third, higher burnout is directly associated with higher psychological distress and loneliness in parallel with the other studies in examining the relationship between burnout and psychological distress (Lopes Cardozo et al., 2012; Sánchez-Moreno et al., 2014). However, there is no significant relationship between burnout and perceived stress among housewives. The insignificant relationship between perceived stress and burnout can be explained by the necessity of a cognitive evaluation of the resources that the individual has. Hence, there is a possibility that stress perception alone may not be sufficient for burnout. However, considering loneliness as an evaluation of social resources, loneliness is associated with burnout with stress perception.

Fourth, higher anxiety is directly associated with higher perceived stress and burnout such as seen in other studies. However, it is not directly associated with loneliness. The insignificance of the relationship between loneliness and anxiety can be explained by the fact that the perception of the lack of resources alone does not cause nervousness, tension, or being on edge. Rather, the presence of emotional, physical, and mental exhaustion after the perception of resource insufficiency makes it possible to facilitate anxiety.

Fifth, perceived stress serves as an intervening variable between both psychological distress and loneliness and psychological distress and anxiety. Higher distress and loneliness relationships are affected by high perceived stress. Also, the mediator role of perceived stress influencing mental health outcomes which is in line with the literature (Staneva et al., 2015). Higher psychological distress is associated with higher perceived stress which results in higher anxiety. Therefore, perceived distress seems to have a crucial role in the relationship between psychological distress and anxiety among housewives. However, perceived stress does not mediate the relationship between psychological distress and burnout. Results reveal that perceived stress is more connected with anxiety rather than burnout in the sample of housewives who do not exhaust under stress evaluation but engage with stress.

Sixth, as stated before, loneliness influences mental health outcomes (Durak & Senol-Durak, 2010). It serves as an intervening variable between psychological distress and burnout, perceived stress and burnout, and perceived stress and anxiety. However, loneliness does not mediate psychological distress and anxiety relationships. Perception towards source insufficiency is not associated with anxiety alone, instead, the relationship between

the perception of resource inadequacy and anxiety only emerges in the presence of emotional, physical, and mental exhaustion in the model.

Seventh, when considering literature about higher burnout leading to higher anxiety (Mark & Smith, 2012), and the mediator role of burnout for mental health outcomes (Ding et al., 2014), burnout is considered as a mediational variable rather than an outcome. Although burnout does not mediate perceived stress and anxiety relationships, it serves as an intervening variable between psychological distress and anxiety, and loneliness and anxiety. Psychological distress relations with burnout are also seen in some other studies (Lopes Cardozo et al., 2012). Burnout is related to the fact that the household members do not help the housewife while doing intensive housework, and as a result, the housewife feels boredom and worthless. Burnout related to those exhausted emotions is included in the model as a non-observable factor between psychological distress and anxiety. In other words, those negative feelings that an individual develops due to household chores are associated with feelings of nervousness, tension, restlessness, and worry.

As mentioned before, a direct relationship with psychological distress and anxiety was found in studies with humanitarian aid workers and social workers (Lopes Cardozo et al., 2012; Sánchez-Moreno et al., 2014).The current study reveals that the mediation relationship between those variables is confirmed among housewives. In the present study, the presence of such intervening variables (i.e., perceived stress, loneliness, and burnout) are shown to be important in between psychological distress and anxiety. Therefore, it is considered that housewives have some unique characteristics such that there are some other variables in the relationship between psychological distress and anxiety. If a housewife perceives higher perceived stress and has feelings of loneliness and exhaustion, those variables mediate the relationship between higher psychological distress and higher anxiety. In other words, the results revealed that psychological distress, perceived stress, and loneliness are considered contributory factors.

The present study has some limitations. Self-report measurement could have a limited effect on the subjectivity in the participants' reports. The possible effect of CVM has been taken into account both during the process of research design and data analysis. Practical and statistical remedies have shown that research findings are less likely to be affected by CMV. Due to the cross-sectional research design, this study lacks to observe the change in anxiety levels over time. For this reason, the adoption of longitudinal research methods is considered as the next step in the study. Last but not least, since this study was conducted with the non-clinical population, it could be a generalizability limitation to the clinical population. Adopting

longitudinal design, using alternative measures, and collecting data from the clinical population may be suggested to address to limitations in future studies.

Also, future research may look into a multigroup comparison between housewives and working women since some studies are focused on the difference between the two participant groups (Dadsetan et al., 2006; Fallahzadeh et al., 2014; Sinha, 2017).

As a result, when considering the mediator role of perceived stress, loneliness, and burnout between psychological distress and anxiety the current study results reveal several implications in clinical practice. Mainly, as seen that, psychological distress and anxiety relations do not reveal direct relations among housewives. Perceived stress, loneliness, and burnout are mediating the relations between the two variables. Understanding the role of burnout and perceived stress mechanism of anxiety among housewives, this study provides crucial empirical information. In the light of the findings of the present study, it should be noted that psychoeducation modules on coping with stress management and burnout syndrome will help to increase the effectiveness of psychotherapy when working with anxiety among housewives. Furthermore, it is suggested that in case of noticing the role of loneliness as a contributory factor, teaching housewives how to manage loneliness might be considered as one agenda for clinicians while with housewives. To have a sense of being with others and disentangle the sense of isolation can be crucial especially in collectivistic cultures. In conclusion, when working with housewives who experience psychological distress and anxiety, it is recommended to prioritize the inclusion of variables loneliness, perceived stress, and burnout in future research.

Declarations

References

Ahola, K., & Hakanen, J. (2007). Job strain, burnout, and depressive symptoms: A prospective study among dentists. *Journal of Affective Disorders, 104*, 103–110.

Andersson, L. (1990). Narcissism and loneliness. *The International Journal of Aging and Human Development, 30*(2), 81–94.

Arbuckle, J. L. (2016). *Amos (Version 24.0) [Computer Program]*. IBM SPSS.

Armon, G., Melamed, S., Toker, S., Berliner, S., & Shapira, I. (2014). Joint effect of chronic medical illness and burnout on depressive symptoms among employed adults. *Health Psychology, 33*(3), 264–272.

Avargues-Navarro, M. L., Borda-Mas, M., Campos-Puente, A. D. L. M., Pérez-San-Gregorio, M. Á., Martín-Rodríguez, A., & Sánchez-Martín, M. (2020). Caring for family members with Alzheimer's and Burnout Syndrome: Impairment of the Health of Housewives. *Frontiers in Psychology, 11*, 576.

Beck, A. T., Epstein, N., Brown, G., & Steer, R. A. (1988). An inventory for measuring clinical anxiety: Psychometric properties. *Journal of Consulting and Clinical Psychology, 56*(6), 893–897. https://doi.org/10.1037/0022-006X.56.6.893

Bener, A. (2013). Psychological distress among postpartum mothers of preterm infants and associated factors: A neglected public health problem. *Revista Brasileira De Psiquiatria, 35*(3), 231–236. https://doi.org/10.1590/1516-4446-2012-0821

Bergmann B. R. (2005) The Occupation of Housewife. In: The Economic Emergence of Women. Palgrave Macmillan, New York. https://doi.org/10.1057/9781403982582_9

Brantley, P. J., Dutton, G. R., Wood, K. B., Bodenlos, J. S., Howe, J., & Jones, G. N. (2005). Minor life events as predictors of medical utilization in low-income African American family practice patients. *Journal of Behavioral Medicine, 28*, 1–7.

Burke, R. J. (1994). Stressful events, work-family conflict, coping, psychological burnout, and well-being among police officers. *Psychological Reports, 75*(2), 787–800.

Burke, R. J., Ng, E. S., & Fiksenbaum, L. (2009). Virtues, work satisfaction and psychological wellbeing among nurses. *International Journal of Workplace Health Management., 2*, 202–219.

Cacioppo, J. T., Hughes, M. E., Waite, L. J., Hawkley, L. C., & Thisted, R. A. (2006). Loneliness as a specific risk factor for depressive symptoms: Cross-sectional and longitudinal analyses. *Psychology and Aging, 21*(1), 140–151. https://doi.org/10.1037/0882-7974.21.1.140

Carson, M. A., Paulus, L. A., Lasko, N. B., Metzger, L. J., Wolfe, J., Orr, S. P., & Pitman, R. K. (2000). Psychophysiologic assessment of posttraumatic stress disorder in Vietnam nurse veterans who witnessed injury or death. *Journal of Consulting and Clinical Psychology, 68*(5), 890.

Chang, S. J., van Witteloostuijn, A., & Eden, L. (2010). From the Editors: Common method variance in international business research. *Journal of International Business Studies, 41*(2), 178–184. https://doi.org/10.1057/jibs.2009.88

Chou, K. L., & Chi, I. (2004). Childlessness and psychological wellbeing in Chinese older adults. *International Journal of Geriatric Psychiatry, 19*(5), 449–457. https://doi.org/10.1002/gps.1111

Cohen, S., Kamarck, T., & Mermelstein, R. (1983). A global measure of perceived stress. *Journal of Health and Social Behavior, 24*, 385–396.

D'souza, F., Egan, S. J., & Rees, C. S. (2011). The relationship between perfectionism, stress and burnout in clinical psychologists. *Behaviour Change, 28*(1), 17.

Dadsetan, P., Ahmadi, A. A., & Hasanabadi, H. R. (2006). Parenting stress and general health: A research on the relation between parenting stress and general health among housewife-mothers and

nurse-mothers with young children. *Developmental Psychology, 2*(7), 171–184.

Díaz-Morales, J. F., & Sánchez-Lopez, M. P. (2008). Morningness-eveningness and anxiety among adults: A matter of sex/gender? *Personality and Individual Differences, 44*(6), 1391–1401.

Ding, Y., Qu, J., Yu, X., & Wang, S. (2014). The Mediating Effects of Burnout on the Relationship between Anxiety Symptoms and Occupational Stress among Community Healthcare Workers in China: A Cross-Sectional Study. *PLoS ONE, 9*(9), e107130. https://doi.org/10.1371/journal.pone.0107130

Durak, M., & Senol-Durak, E. (2010). Psychometric qualities of the UCLA loneliness scale-version 3 as applied in a Turkish culture. *Educational Gerontology, 36*(10–11), 988–1007.

Durak, M., & Senol-Durak, E. (2011). Turkish validation of the emotional approach coping scale. *Psychological Reports, 109*(1), 147–166. https://doi.org/10.2466/02.08.20.21.pr0.109.4.147-166

Eskin, M., Harlak, H., Demirkıran, F., & Dereboy, Ç. (2013). Algılanan Stres Ölçeğinin Türkçeye uyarlanması: Güvenirlik ve geçerlik analizi. *New/yeni Symposium Journal, 51*(3), 132–140.

Fallahzadeh, H., Ghafarikia, M., Keyghobady, N., & Saadati, H. (2014). Comparison of depression and anxiety in employed women with housewives women in Shiraz City in 2012. *The Journal of Tolooe-Behdasht, 13*(1), 115–123.

Ferraro, K. F., & Nuriddin, T. A. (2006). Psychological distress and mortality: Are women more vulnerable? *Journal of Health and Social Behavior, 47*(3), 227–241. https://doi.org/10.1177/002214650604700303

Gaskin, J. (2017, December 6). *Amos Plugin Specific Bias Test (CMB)*. Gaskination\'s StatWiki. Retrieved August 12, 2021, from https://www.youtube.com/watch?v=abzt5zTkCxk&t=111s

Gaskin, J. (2021, April 9). *Common Method Bias (CMB)*. Gaskination\'s StatWiki. Retrieved August 12, 2021, from http://statwiki.gaskination.com/index.php?title=CFA#Common_Method_Bias_.28CMB.29

Geuens, N., Braspenning, M., Van Bogaert, P., & Franck, E. (2015). Individual vulnerability to burnout in nurses: The role of Type D personality within different nursing specialty areas. *Burnout Research, 2*(2–3), 80–86. https://doi.org/10.1016/j.burn.2015.05.003

Goldberg, D., & Williams, P. (1988). *A user's guide to the General Health Questionnaire*. Windsor: NFER-Nelson.

Goldstein-Gidoni, O. (2018). Consuming domesticity in post-bubble Japan. In K. J. Cwiertka & E. Machotka (Eds.), *Consuming life in postbubble Japan: A transdisciplinary perspective* (pp. 107–128). Amsterdam University Press. https://doi.org/10.5117/9789462980631/ch05

Haggett, A. (2009). Desperate Housewives and the Domestic Environment in post-war Britain: Individual Perspectives. *Oral Hist (colch), 37*(1), 53–60.

Hair, J. F., Black, W. C., Babin, B. J., & Anderson, R. E. (2014). *Multivariate data analysis* (7th ed.). Pearson Education Limited.

Harilal, A., & Santosh, V. A. (2017). A comparative study on stress levels among working women and housewives with reference to the state of Kerala. *NMIMS Journal of Economics and Public Health Policy, 2*(1), 29–35.

Heikkinen, R., & Kauppinen, M. (2004). Depressive symptoms in late life: A 10-year follow-up. *Archives of Gerontology and Geriatrics, 38*, 239–250.

Hendry, J. (2017). The role of the professional housewife. In *An Anthropological Lifetime in Japan* (pp. 352–367). Brill.

Hu, L., & Bentler, P. M. (1999). Cutoff criteria for fit indexes in covariance structure analysis: Conventional criteria versus new alternatives. *Structural Equation Modeling: A Multidisciplinary Journal, 6*(1), 1–55. https://doi.org/10.1080/10705519909540118

Kaplan, V. (2021). The burnout and loneliness levels of housewives in home-quarantine during Covid-19 pandemic. *Kıbrıs Türk Psikiyatri Ve Psikoloji Dergisi, 3*(2), 115–122.

Kaur, N., Panwar, N., Thind, H., & Farooqi, M. (2011). A comparative study of working and non-working married women: Effect of anxiety level on life satisfaction. *Indian Journal of Psychology and Mental Health*.

Kilic, C., Rezaki, M., Rezaki, B., Kaplan, I., Ozgen, G., Sagduyu, A., & Ozturk, M. O. (1997). General Health Questionnaire (GHQ12 & GHQ28): Psychometric properties and factor structure of the scales in a Turkish primary care sample. *Social Psychiatry and Psychiatric Epidemiology, 32*(6), 327–331. https://doi.org/10.1007/bf00805437

Kline, R. B. (2021). *Principles and practice of structural equation modeling* (3rd ed.). The Guilford Press.

Koutsimani, P., Montgomery, A., & Georganta, K. (2019). The relationship between burnout, depression, and anxiety: A systematic review and meta-analysis. *Frontiers in Psychology, 10*, 284. https://doi.org/10.3389/fpsyg.2019.00284

Krishnaveni, R., & Deepa, R. (2013). Controlling Common Method Variance while Measuring the Impact of Emotional Intelligence on Well-being. *Vikalpa: the Journal for Decision Makers, 38*(1), 41–48. https://doi.org/10.1177/0256090920130104

Kwag, K. H., Martin, P., Russell, D., Franke, W., & Kohut, M. (2011). The impact of perceived stress, social support, and home-based physical activity on mental health among older adults. *The International Journal of Aging and Human Development, 72*(2), 137–154.

Lazarus, R. S. (2006). *Stress and emotion: A new synthesis*. Springer Publishing Company.

Lazarus, R. S., & Folkman, S. (1984). *Stress, Appraisal, and Coping* (1st ed.). Springer Publishing Company.

Lebert-Charron, A., Dorard, G., Wendland, J., & Boujut, E. (2021). Who are and are not the burnout moms? A cluster analysis study of French-speaking mothers. *Journal of Affective Disorders Reports, 4*, 100091.

Leiter, M. P., & Maslach, C. (2015). Job burnout. *Wiley Encyclopedia of Management*, pp. 1–2.

Lindell, M. K., & Whitney, D. J. (2001). Accounting for common method variance in cross-sectional research designs. *Journal of Applied Psychology, 86*(1), 114–121. https://doi.org/10.1037/0021-9010.86.1.114

Lopes Cardozo, B., Gotway Crawford, C., Eriksson, C., Zhu, J., Sabin, M., Ager, A., Foy, D., Snider, L., Scholte, W., Kaiser, R., Olff, M., Rijnen, B., & Simon, W. (2012). Psychological distress, depression, anxiety, and burnout among ınternational humanitarian aid workers: A longitudinal study. *PLoS ONE, 7*(9), e44948. https://doi.org/10.1371/journal.pone.0044948

Lubbadeh, T. (2020). Job burnout: A general literature review. *International Review of Management and Marketing, 10*(3), 7.

MacKenzie, S. B., & Podsakoff, P. M. (2012). Common method bias in marketing: Causes, mechanisms, and procedural remedies. *Journal of Retailing, 88*(4), 542–555. https://doi.org/10.1016/j.jretai.2012.08.001

Mark, G., & Smith, A. P. (2012). Occupational stress, job characteristics, coping, and the mental health of nurses. *British Journal of Health Psychology, 17*(3), 505–521. https://doi.org/10.1111/j.2044-8287.2011.02051.x

McDonough, P., & Strohschein, L. (2003). Age and the gender gap in distress. *Women & Health, 38*(1), 1–20.

Mikolajczak, M., & Roskam, I. (2020). Parental burnout: Moving the focus from children to parents. *New Directions for Child and Adolescent Development, 174*, 7–13. https://doi.org/10.1002/cad.20376

Mikolajczak, M., Gross, J. J., & Roskam, I. (2021). Beyond job burnout: Parental burnout! *Trends in Cognitive Sciences, 25*(5), 333–336. https://doi.org/10.1016/j.tics.2021.01.012

Mo, P. K., Cheng, Y., & Lau, J. T. (2020). Work-related factors on mental health among migrant factory workers in China: Application of the demand-control and effort-reward ımbalance model. *Health & Social Care in the Community*.

Monroe, S. M., & Simons, A. D. (1991). Diathesis-stress theories in the context of life stress research: Implications for the depressive disorders. *Psychological Bulletin, 110*(3), 406.

Mourad, M., Levendosky, A., Bogat, G. A., & Eye, A. (2008). Family psychopathology and perceived stress of both domestic violence and negative life events as predictors of women's mental health symptoms. *Journal of Family Violence, 23*, 661–670. https://doi.org/10.1007/s10896-008-9188-1

Mushtaq, R., Shoib, S., Shah, T., & Mushtaq, S. (2014). Relationship between loneliness, psychiatric disorders and physical health? A review on the psychological aspects of loneliness. *Journal of Clinical and Diagnostic Research, 8*(9), WE01-WE4. https://doi.org/10.7860/jcdr/2014/10077.4828

Nolen-Hoeksema, S., & Ahrens, C. (2002). Age differences and similarities in the correlates of depressive symptoms. *Psychology and Aging, 17*(1), 116–124. https://doi.org/10.1037/0882-7974.17.1.116

Norberg, A. L. (2007). Burnout in mothers and fathers of children surviving brain tumour. *Journal of Clinical Psychology in Medical Settings, 14*(2), 130–137.

Panwar, N., & Srivastava, S. (2019). Job V/s. home demands: A comparative study between life satisfaction, physical and mental stress in indian housewives and employed women. *Indian Journal of Physiotherapy & Occupational Therapy, 13*(3), 68.

Pines, A. M., Neal, M. B., Hammer, L. B., & Icekson, T. (2011). Job burnout and couple burnout in dual-earner couples in the sandwiched generation. *Social Psychology Quarterly, 74*(4), 361–386.

Podsakoff, P. M., MacKenzie, S. B., Lee, J. Y., & Podsakoff, N. P. (2003). Common method biases in behavioral research: A critical review of the literature and recommended remedies. *Journal of Applied Psychology, 88*(5), 879–903. https://doi.org/10.1037/0021-9010.88.5.879

Priya, M., & Ahmad, A. (2021). Perceived mental health and subjective well-being among women: A study with reference to Khgaria District of North Bihar, India. *Saudi Journal of Humanities and Social Sciences, 6*(9), 306–312. https://doi.org/10.36348/sjhss.2021.v06i09.001

Ramírez, M. T. G., Hernández, R. L., & de la Rubia, J. M. (2009). Cuestionario de Burnout para amas de casa (CUBAC): Evaluación de sus propiedades psicométricas y del Modelo Secuencial de Burnout. *Universitas Psychologica, 8*(2), 533–543.

Roskam, I., Aguiar, J., Akgun, E., Arikan, G., Artavia, M., Avalosse, H., ... & Mikolajczak, M. (2021). Parental burnout around the globe: A 42-country study. *Affective Science*, *2*(1), 58–79.

Russell, D. W. (1996). UCLA Loneliness Scale (Version 3): Reliability, validity, and factor structure. *Journal of Personality Assessment, 66*(1), 20–40.

Sánchez-Moreno, E., de La Fuente Roldán, I. N., Gallardo-Peralta, L. P., López, B., & de Roda, A. (2014). Burnout, informal social support and psychological distress among social workers. *The British Journal of Social Work, 45*(8), 2368–2386.

Saravi, F. K., Navidian, A., Rigi, S. N., & Montazeri, A. (2012). Comparing health-related quality of life of employed women and housewives: A cross sectional study from southeast Iran. *BMC Women's Health, 12*(1), 1–5.

Schermelleh-Engel, K., & Moosbrugger, H. (2003). Evaluating the fit of structural equation models: Tests of significance and descriptive goodness-of-fit measures. *Methods of Psychological Research Online, 8*(2), 23–74.

Senol-Durak, E., & Durak, M. (2020). Psychometric Evaluation of the Turkish Version of the Housewives Burnout Questionnaire (CUBAC). *AYNA Klinik Psikoloji Dergisi, 7*(2), 128–145.

Sinha, S. (2017). Multiple roles of working women and psychological well-being. *Industrial Psychiatry Journal, 26*(2), 171–177. https://doi.org/10.4103/ipj.ipj_70_16

Smadi, E. Y. (2019). Psychological burnout of women working and housewives at the Menopausal Stage in Amman City / Jordan. *Asian Social Science, 15*(2), 124–132. https://doi.org/10.5539/ass.v15n2p124

Soontornthum, T., Cui, L., Lu, V. N., & Su, J. (2020). Enabling SMEs' learning from global value chains: Linking the logic of power and the logic of embeddedness of interfirm relations. *Management International Review, 60*(4), 543–571. https://doi.org/10.1007/s11575-020-00425-8

Staneva, A., Bogossian, F., Pritchard, M., & Wittkowski, A. (2015). The effects of maternal depression, anxiety, and perceived stress during pregnancy on preterm birth: A systematic review. *Women and Birth, 28*(3), 179–193.

Stanton, A. L., Kirk, S. B., Cameron, C. L., & Danoff-Burg, S. (2000). Coping through emotional approach: Scale construction and validation. *Journal of Personality and Social Psychology, 78*(6), 1150–1169. https://doi.org/10.1037/0022-3514.78.6.1150

Tabachnick, B. G., & Fidell, L. S. (2013). *Using multivariate statistics* (6th ed.). Pearson Education Limited.

Tavella, G., Hadzi-Pavlovic, D., & Parker, G. (2020). Burnout: Re-examining its key constructs. *Psychiatry Research, 287*, 112917.

Taylor, S. E. (2009). *Health Psychology*. McGraw-Hill Ryerson.

TurkStat (2019). TUIK Adrese Dayalı Nüfus Kayıt Sistemi: Merkezi Dağıtım Sistemi Uygulaması (MEDAS). *Türkiye İstatistik Kurumu, Merkezi Dağıtım Sistemi*. https://biruni.tuik.gov.tr/medas/?locale=tr

Ulusoy, M., Sahin, N. H., & Erkmen, H. (1998). Turkish version of the beck anxiety inventory: Psychometric properties. *Journal of Cognitive Psychotherapy: An International Quarterly, 12*(2), 163–172.

VerBruggen, R., & Wang, W. (2019). The real housewives of America: dad's income and mom's work. *Institute for Family Studies*, *23*.

Wang, W. (2013). *Parents' time with kids more rewarding than paid work-And more exhausting*. Pew Research Center.

Wang, W., Wang, S., Liu, X., & Li, Y. (2021). Parental and job burnout in a Chinese sample. *Current Psychology*. Published. https://doi.org/10.1007/s12144-021-01498-w

Williams, L. J., Hartman, N., & Cavazotte, F. (2010). Method variance and marker variables: A review and comprehensive CFA marker technique. *Organizational Research Methods, 13*(3), 477–514. https://doi.org/10.1177/1094428110366036

Xu, Z., & Yang, F. (2018). The impact of perceived organizational support on the relationship between job stress and burnout: A mediating or moderating role? *Current Psychology, 40*(1), 402–413. https://doi.org/10.1007/s12144-018-9941-4