

# Clarifying Individual Predictors of Musculoskeletal Pain Inhibition and Expression in Housewives: a Qualitative Study

#### ARTICLEINFO

Article Type

Original article

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#### How to cite this article

Norouzi S, Tavafian SS, Cousins R, Mokarami H. Clarifying individual factors and predictors of musculoskeletal pain inhibition and expression in housewives: a qualitative study. Int. J. Musculoskelet. Pain. Prev. 2023; 8(4): 954-959.

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# doi 10.22034/ijmpp.8.4.954

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Article History
Received: Oct 6, 2023
Accepted: Dec 6, 2023
ePublished: Dec 30, 2023

#### ABSTRACT

**Aims:** The expansion of the female population in society and the high prevalence of Musculoskeletal Disorders (MSDs) a significant issues because these disorders directly affect the quality of life and lead to an inability and also an increase in individual and social costs. Therefore, the present study was conducted to explain the predictors related to MSDs in women who are housewives.

**Method and Materials:** The present qualitative study was conducted among the housewives of Akbar Abad city in Fars province of Iran. This study was conducted in 2020 using the method of conventional content analysis and using the purposeful sampling method in a semi-structured way. Informed consent was obtained from the participants. The inclusion criteria included married women who were housewives and had musculoskeletal pain in one or more areas of their bodies.

**Findings:** After analyzing the results, the predictors of pain inhibition and expression were extracted in three main categories, including personality and cognitive characteristics, cultural factors, and the individual's living conditions.

**Conclusion:** These results showed that the women who had more confidence, skills, and expectation beliefs were more likely to exhibit proper back behavior. In this regard, MSD prevention interventions should address using key individual cognitive factors that consider the potential change strategies.

## Keywords: Musculoskeletal Disorders, Housewives, Qualitative Study

### Introduction

Musculoskeletal disorders (MSDs) are injuries that involve different parts of the body [1]. In this regard, back pain and neck caused have high percentage of health problems [2]. Various individual, environmental, and social factors are effective in of occurrence the skeletal disorders [3]. Studies have shown that women are at a higher risk than men in terms musculoskeletal conditions [4'5]. Although housewives suffer from various skeletal problems, it is still not clear how they take care of their health and what attitude they have that harms or helps their health. For this reason, it is very important to consider what has a positive and negative effect on women's health. Despite the high prevalence of musculoskeletal disorders housewives. few studies have

Many individual factors, including age and body mass, have been considered the cause of these disorders [8], but the behavioral factors that cause musculoskeletal disorders from the perspective of housewives have been less investigated. The availability of information on the individual characteristics housewives and their risk factors can provide knowledge that will basis for the providing preventive and therapeutic Many of the interventions. experiences, perceptions, opinions, and characteristics that form the basis of housekeeping experience cannot investigated through quantitative studies. In addition, due to the influence of social and cultural factors, values, and traditions in domestic activities, the necessity of qualitatively examining the experience and perspective of housewives in different cultures necessarv

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housewives have different personality traits that affect their housekeeping activities. In the experiences skeletal disorders of housewives, especially in the case of women living in the city of Akbarabad with special traditions and culture, risky behaviors could be seen, so the research team in this study decided to investigate the types of these risk factors through a qualitative study. Therefore, for better understanding, the present study was carried out under the title of explaining predictors related to MSDs in housewives living in Akbarabad city.

### **Method and Materials**

This study was approved by the ethics committee of Tarbiat Modares University with a code of ethics (IR.MODARES.REC.1398.038). This qualitative study was conducted using the conventional content analysis method [9] to explain the predictors of skeletal pain inhibition and expression in Akbarabad city for 13 months. In this regard, 24 semistructured interviews were collected. A written consent form was completed by the participants. The inclusion criteria included housewives who were willing to participate in the study and had experienced skeletal pain in one or more areas of their body. The exclusion criteria included having another job in addition to housekeeping, and suffering from severe chronic disease or depression, to be able to participate in the interview. To preserve the principle of diversity according qualitative studies, housewives with different ages, education, economic status, and number of children were interviewed [10]. The interviews were conducted over the phone or in person, with an average time of 30-70 minutes. It was recorded using the device and typed word by word. To analyze the typed text or recorded audio units, they were read or heard several times, and primary codes were extracted by breaking the text into semantic units. Coding was done using MAXQDA 2018 software. The primary codes were categorized based on their similarities and differences. The obtained categories were reclassified in the process of data analysis through comparison, which was back-andforth, and the Member Check method was

used to remove any ambiguities [11]. The obtained codes were reviewed and modified by the Peer Check method through the team of researchers and External Checks, with the presence of 4 experienced professors in the field of qualitative studies and experts [12]. Credibility was established through long-term engagement in data collection (thirteen months) and member checking (by asking the participants to confirm the accuracy of the contents of the transcripts, and to revise them if necessary). The data analysis process was conducted by a research team who were experts in different fields of ergonomics, health promotion, human behavior, and psychology through reviewing the extracted codes and related categories.

# **Findings**

As a result of data analysis, predictive factors related to MSDs in housewives were extracted from three main categories, including personality and cognitive characteristics, cultural factors, and individual living conditions, which included 8 subcategories.

1- Personality and cognitive characteristics included four subcategories, including adaptation to pain, which meant that being believed they should deal with their pain under any circumstances and make it appear normal because pain is a permanent phenomenon and has no cure. (I have to deal with my pain because there is no other way... p10-63), Some participants believed that the reason for not paying attention to pain was the existence of various pains. One participant stated, "I have a lot of pain that I have to endure; if I don't endure it, my health condition will get worse" (Participant number 13, aged 49 years). Perfectionism in doing household activities in some participants, obsession and high sensitivity towards the cleanliness of the house, and the completeness and excellence of all things in the house were considered the reasons for the existence of skeletal disorders. In this regard, one participant said, "I only accept my own work "(Participant number 22, aged 37 years). Dedication of the participants due to the young age of the children, and the busyness of their husbands and other family members,

were the reasons that they preferred to do the household chores alone and without asking for others' help. In this regard, one participant stated "My husband is always at work and when came home is so tired" (Participant number 24, aged 41 years). Another belief that the participants mentioned was about their fear experience related to skeletal pain, which was associated with a lack of therapeutic actions. In this regard, one participant said, "I do not go to the doctor for my back pain because of my fear due to the surgery suggestion by physician" Participant number 5, aged 56 years). 2- Cultural factors include two subclasses of normative beliefs, such as the belief that housekeeping is just for women's duties and that men do not have any housekeeping responsibilities. (Participant number 23, aged 27 years). Another normative belief was

cultural taboos, such as this that the daughterin-law has to do all duties. In this regard, one participant said, "I must do all the household chores alone, otherwise I will be labeled as unhelpful one (Participant number 3, aged 33 years).

3: The living conditions of the person, like the distance of the husband's workplace from the house, were other factors leading to MSDs. In this regard, one participant stated, "I have all the responsibility of taking care of the children and managing the household because my husband did not have any time to help me (Participant number 5, aged 56 years). Another factor, such as economic conditions, stated by the participants. participant stated," I don't have the financial ability to buy proper shoes, and it has led to my knee pain (Participant number 6, aged 65 years).

**Table 1)** Demographic characteristics of participants

Number of Participants	Age(years)	Duration of marriage	Number of children	Body Mass Index
1	44	25	3	30.5
2	40	20	2	19.2
3	33	18	3	28.1
4	44	24	4	25.0
5	41	22	4	23.4
6	65	50	3	27.5
7	44	22	3	34.0
8	42	22	3	36.5
9	24	3	0	22.3
10	63	50	7	25.3
11	57	48	4	27.0
12	42	13	3	30.4
13	49	36	3	29.7
14	45	20	1	30.1
15	57	37	3	23.4
16	48	28	3	27.0
17	41	22	1	25.5
18	42	23	3	26.2
19	46	29	3	23.6
20	35	13	2	28.7
21	32	13	3	27.5
22	37	23	3	36.1
23	27	5	1	24.8
24	41	20	2	25.2

# **Discussion**

Adaptation to pain was a subset of housewives' personality traits. Women believed that skeletal pain was incurable and

unpreventable. On the other hand, women believe that their pain is not so important that they want to do something to relieve it. That is why they preferred to hide it. Lack of attention to personal health in women can be due to their lack of awareness. Many of them also fought with their pain for years and considered the existence of pain as a normal element in their daily life. Studies have shown that women have naturally learned to live with pain, and physical pain leads to permanent pain and disability in their lives [13]. Therefore, denying or running away from pain can have a negative effect on the suffering skeletal experience of from disorders, and sometimes it has caused irreparable damage [14]. Housewives believed that all household activities should be done perfectly. This thinking led them to spend a lot of time cleaning the home environment, and this work wasted a lot of time and energy. In the long run, they felt tired and had various pains. According to other studies, what is more important in the occurrence of these disorders are the underlying beliefs, cognitive and metacognitive factors, which often play a between thoughts mediating role and obsessive impulses, and compulsive actions, and play an important role in the continuation of the disorder [15]. In this study, women believed that because they were housewives and had no other job, they had to do all the household chores alone. They believed that because their wife and children had other duties to do, they had the duty to do all the work alone despite all the pain. According to Zahed et al.'s study [16], the feeling of responsibility and commitment of family members towards each other is considered honorable, and children were even willing to risk their health so that their elderly parents could receive better care. The difference that the sense of self-sacrifice in the present study was stronger on the part of mothers, but this sense was more pronounced in children compared to their elderly parents [17, 18]. musculoskeletal Experiencing housewives causes them to fear and leads to pain intensification. Participants were afraid to go to the doctor because they thought they would need surgery. According to studies, people with musculoskeletal disorders may avoid behaviors such as resting and visiting a doctor, which was almost consistent with the present qualitative results [19]. According to

the study [20] and according to the fearavoidance theory, the greater the feeling of fear in a person, the more catastrophic the pain is [21,22]. Culture plays an important role in doing housework [23]. In the present study, the participants considered it very important to show themselves strong, which led them to do housework in any situation, regardless of the pain they had. What was considered taboo for the participants in this qualitative study may be normal and non-taboo in other societies? One of the reasons that leads a housewife to consider such topics forbidden is the cultural context. Another topic related to the taboo was related to the period of housewives. According to them, no one should notice their period. Housewives who experienced periods would hide them so that no one would notice. This led women to endure pain and a lot of pressure. On the other hand, the presence of shame in women led them to be cautious about this issue and not to cause harm to those around them. Women's husbands had to be away from the family environment for a long time due to their jobs, so many household responsibilities were the responsibility of the woman. In addition to the duties of the housewife, there was also the care of the children, which led to multiplying the responsibilities of women. Negative experiences affect people's lives in various ways, during which conditions are created that lead to women not coping and ultimately lead to depression and skeletal pain. Other research showed that the death of loved ones, various diseases, and family problems lead to anxiety, and anxiety also leads to different reactions [24,25]. A study on women showed that unexpected life events and stress have a positive relationship with the occurrence of musculoskeletal disorders, and it shows that understanding women's mutual relationships is essential in managing their lives [26]. The findings showed that important life events such as financial problems and environmental factors have a very important effect on musculoskeletal problems [27]. On the other hand, studies have shown that there is a direct relationship between musculoskeletal problems and the pain caused by them and the inability to

perform physical activities, which leads to reduced performance, weakness, reduced social well-being, and individual independence [28]. The results of the studies were in line with the results of the present study. For example, housewives said that having economic problems made them unable to buy proper shoes, and this was the reason for the pain in their feet and knees. In addition, some participants stated that if there were facilities such as a dishwasher in the kitchen, many of their pains would not exist. Among the people participating in this qualitative study, only one of the participants had facilities such as a dishwasher.

## Conclusion

Women's experiences related to the predictors of inhibition and expression related to musculoskeletal disorders showed that they can control their pain to some extent, although they mentioned different reasons for suffering from their pain. They believed that the aggravation of their pain could lead to psychological symptoms and depression. Women continued to do activities that negatively affected their pain. People with musculoskeletal disorders need to know what factors need to be controlled and how to do it so that they can recognize ways to live with pain and focus on personal strength and positive things instead of making pain a priority [14]. Environmental, cultural, and interpersonal factors are an important issue that leads to the occurrence of many musculoskeletal problems in women. To improve the quality of life of housewives in all dimensions that can be intervened in, logical and applicable solutions should be used. The strength of this study was the presence of participants with the greatest difference to extract more reliable data. The limitations of the study include the non-cooperation of some housewives, conducting the study on the housewives of one region, and due to the lack of easy access to the participants, some conducted interviews were bv Although telephone interviews cannot understand non-verbal communication, the interviews of these participants evaluated in an open, individual, and time frame of their choice, and were very rich in

details. Suggestions for the implementation of future studies also include the creation of organizations to directly monitor the work of housewives and the creation of policy programs to provide financial and social support for housewives.

# Acknowledgments

The study team thanks all the participants.

## **Authors' Contribution**

SN was the main researcher, SST was the supervisor of the study, and RC and HM were advisors of the study.

#### Conflicts of Interest

There are no conflicts of interest in this study

### **Ethical Permissions**

This study was approved by the ethics committee of Tarbiat Modares University with a code of ethics (IR.MODARES.REC.1398.038).

# **Findings**

None

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