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Original Article

The effectiveness of self-compassion training on the intensity of chronic pain in women under domestic violence

Ezzatollah Ahmadi [1*] & Fereshteh Mirmohammadi [2]

1. Department of psychology ,Azarbijan Shahid Madani University, Tabriz,Iran.
2. Department of psychology, Azarbijan Shahid Madani University,Tabriz,Iran.

Abstract

Domestic violence is a serious issue throughout the world which affects many women regardless of their demographic characteristics. The experience of being exposed to violence puts women at greater risk of chronic pain syndrome and psychosomatic disorders. The purpose of this study was to examine the effectiveness of self-compassion training on the severity of chronic pain in women subjected to domestic violence. It was conducted with a single-subject experimental method with A-B repetition along with the baseline and intervention steps. After the baseline, self-compassion training was conducted according to Gilbert's protocol for three participants. A visual pain assessment scale (VAS) was used to measure pain intensity. The results of the visual analysis showed that there was a significant reduction in chronic pain due to self-compassion training in all three participants from the baseline stage to the end of the treatment. According to the results, self-compassion training was effective on the severity of chronic pain in women subjected to domestic violence. Therefore, teaching self-compassion can be considered by psychologists and counselors as one of the ways to treat and prevent injuries caused by domestic violence in women under violence.

Keywords

Chronic pain
Domestic violence
Self-compassion
Women

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Introduction

Domestic violence is a pervasive global problem that affects a large number of women regardless of their demographic characteristics (Mazibuko and Umejesi, 2015; Dobash and Dobash, 2017; Sedziafa et al., 2019; Mirjafari et al., 2022).

The most common type of domestic violence is intimate partner violence (IPV) against women (WHO, 2023). Domestic violence is defined as a variety of violent behaviors (physical, sexual, and emotional) and is usually seen as intimate partner violence between men and women, but can also include children, the elderly, or siblings (Hegarty et al., 2000). The most accurate estimates of the prevalence of intimate partner violence are provided by survivor reports. A 2018 analysis of prevalence data from 2000 to 2018 in 161 countries and regions, conducted by WHO on behalf of the United Nations Inter-Agency Working Group on Violence Against Women, found that worldwide, approximately 1 in 3 or 30% of women have been exposed to physical and/or sexual violence by an intimate partner or non-partner sexual violence or both (WHO, 2023).

The experience of being exposed to violence, makes women more at risk of depression (Mazza et al., 2021). suicide attempt (Kandeger and Naziroglu, 2021), chronic pain syndrome (Chandan et al., 2021), psychosomatic disorders, physical injury, Gastrointestinal system disorders, irritable bowel syndrome, and various reproductive health consequences (Fisher et al., 2007). Persistent pain is defined as pain for more than 3 months, which significantly negatively affects quality of life and physical functioning (Andrews et al. , 2018) Persistent pain is a term used instead of chronic pain. Estimates of the global prevalence of persistent pain are between 30% and 50% (Goldberg and McGee, 2011; Elzahaf et al., 2012; Fayaz et al., 2016; Andrews et al., 2018). The role of gender in persistent pain has been demonstrated, with women experiencing more persistent pain compared to men (Berkley, 1997; Blyth et al., 2001; Breivik et al., 2006; Cimmino et al., 2011). A common social factor in the experience of persistent pain is the history of intimate partner violence (Chandan et al., 2021), which is defined as emotional, physical, or sexual harm experienced during a current or former intimate relationship. Various observed studies (Plichta, 2004; Leserman and Drossman,

Corresponding author: Department of psychology, Azarbijan Shahid Madani University, Tabriz, Iran. E-mail: **Amiraliahmadi91@yahoo.com**

2007; Bonomi et al., 2009; Ayre et al., 2016; Sedziafa et al., 2019; Arisukwu et al., 2021). have shown that persistent pain is one of the most reported health outcomes associated with intimate partner violence. Furthermore, men and women disproportionately experience intimate partner violence and persistent pain (Berkley, 1997; Cimmino et al., 2011; Rovner et al., 2017). Intimate partner survivors need interventions that target the processes that maintain these disorders. Survivors report high levels of shame, guilt, and self-blame related to IPV, especially following chronic abuse (Kubany et al., 1996; Karakurt et al., 2014). These feelings may be due to the belief that the partner is a bad partner for life (after leaving the relationship) or a reaction to prevent premature leaving (Kubany and Ralston, 2008).

Shame and guilt increase the influence of PTSD by creating experiential avoidance of unprocessed traumatic memories (Joseph et al., 1997) and rumination about how the person could have acted differently. Shame may also contribute to anxiety by creating perceptions of low coping ability (Fergus et al., 2010).

(Lepisto et al., 2011) found that people in homes where there is violence are more likely to rate their life satisfaction lower compared to homes without violence. Research shows that low life satisfaction stems not only from exposure to violence but also from self-compassion (Yang et al., 2016; Bogolyubova et al., 2020) Self-compassion has been conceptualized as a positive indicator of mental health (Morley, 2015). Experiencing trauma can change many people's core beliefs and assumptions about themselves, the future, safety (personal and public), and the goodness of others (Scoglio et al., 2018). Experiencing pain creates unpleasant emotions such as anger and anxiety. When a person experiences pain the automatic arousal increases and the pain intensifies, and the motivation of the person to accept the treatment and control the pain decreases (Kennedy and Llewelyn, 2006), Studies show that increasing self-compassion is associated with increasing pleasant emotions and decreasing unpleasant emotions (Arimitsu and Hofmann, 2015). Self-compassion, rather than harsh self-criticism, includes kindness and understanding and acceptance of oneself in cases of pain or failure, understanding one's experiences as part of the larger human experience, rather than seeing them as unique to one's own, and having painful thoughts and feelings in Awareness of the mind, rather than over-identification with them (Scoglio et al., 2018).

Research shows that creating and maintaining a compassionate perspective can help counteract the negative effects of exposure to trauma (Seligowski et al., 2015). A review of studies related to self-compassion and chronic pain shows that treatments related to self-compassion are effective in people with chronic physical conditions (Kılıç et al., 2021). Also, studies show that patients with chronic pain do not have enough self-compassion (Narimani et al., 2020).

Reviewing the studies conducted in the field of the effectiveness of self-compassion on chronic pain, no study was found that specifically investigated the effectiveness of self-compassion on the group of women subjected to domestic violence, most of the studies in this field focus on general groups experiencing chronic pain (Ziemer et al., 2015; Edwards, Pielech et al., 2019; Penlington, 2019; Gooding et al., 2020).

Considering the spread of domestic violence and the fact that most of its victims are women, as well as the psychological damage caused by domestic violence, in addition to the important and fundamental role of women in the center of the family and society, the purpose of this research is to investigate the effectiveness of teaching self-compassion on the severity chronic pain in women subjected to domestic violence and seeks to answer the question whether teaching self-compassion is effective on the severity of chronic pain in women subjected to domestic violence.

Method

Participants

The current research was conducted experimentally with a single subject method with A-B repetition along with the baseline and intervention steps. After determining the baseline, self-compassion training was carried out for three participants based on Gilbert's protocol (2014 translated by Faizi and Profiy, 2015). This training consisted of eight 70-minute sessions held weekly. The summary of the meetings is reported in Table 1. The participants were measured in the third, fifth and eighth sessions. The sample included women under domestic violence who referred to Marafet counseling center in 1401 in Tabriz with Experience chronic pain. From this statistical population, 3 people were selected purposefully. The inclusion criteria include (having chronic pain, being at least 18 years old, having at least a diploma education, not having psychological disorders (which was done based on a clinical interview), not having the intention and desire to commit suicide, not having fixed drug treatment for at least 10 weeks, and not the use of painkillers). Exclusion criteria included receiving psychological treatments at the same time and unwillingness to continue the treatment. In order to comply with research ethics, a consent letter was obtained from the participants and they were assured that they can withdraw from the research whenever they wish. The implementation method was that after the clinical interview, the participants were given a questionnaire to complete as a baseline, then in three other stages, i.e., the third session, the fifth session, and the eighth session, after the intervention, the questionnaire was completed.

Instrument

In this study, the McGill visual pain assessment scale (VAS) was used to measure pain intensity. This scale is one of the pain rating scales that was used for the first time by Melzak on patients with different types of pain

and its validity was confirmed in 1975 (Melzack, 1975). Visual pain measurement scale is one of the most widely used pain measurement tools in the world. The most important feature of this tool is its ease of use. This tool is a 10 cm standard, the left side of which is the number zero, which indicates no pain, and the right side is the number 10, which indicates the most severe pain. Obtaining a score of 1-3 indicates mild pain, 4-7 indicates moderate pain, and 8-10 indicates severe pain (Memarian et al., 1999). The reliability of this tool was calculated by Cronbach's alpha method as 0.76 (Abbasi et al., 2012). In addition, its validity and reliability have been confirmed in various studies (Strong et al., 1991; Majani et al., 2003).

In addition, the validity of the content of this questionnaire, after translation and editing, has been reviewed and approved by five members of the faculty of Mashhad University of Medical Sciences (Abbasi et al., 2012).

Table 1. Summary of self-compassion training sessions Gilbert (2014)

Session Content
First, introducing and communicating with the participants and stating the purpose of training (reducing chronic pain), conceptualizing training Focused on self- compassion and teaching the difference between Self-compassion and compassion for others
Second, mindfulness training (body and breathing techniques), getting to know the brain systems based on self-compassion, training to understand and understand that people feel that they should follow things with an empathetic attitude. Providing homework
Third, training related to the issues of women under domestic violence to increase self-care and attention and take the pressure off their shoulders. A feeling of warmth and kindness towards oneself was taught. All people have flaws (human shares) and not to blame themselves for problems. Individuals were empowered to attend to their own and others' suffering without turning away or avoiding it. In addition, empathy was taught and homework was provided Fourth, reviewing the previous session, teaching about accepting mistakes and forgiving in order to make changes, reminding the value of having compassion for oneself and empathy for oneself and others, identifying and applying exercises for cultivating a compassionate mind, and finally giving them homework became.
Fifth, the review of the previous session, the previous and new exercises of cultivating a compassionate mind, includes forgiveness and acceptance without judgment, training to accept progressive changes and the ability to endure difficult and challenging life conditions and facing domestic violence.
Sixth, the review exercise of the previous session, the exercise of creating compassionate images was done scientifically. The styles and methods of expressing compassion, including verbal compassion, practical compassion, cross-sectional compassion, and continuous compassion, were taught. How to use these methods in everyday life in relation to others was explained. Training to create valuable feelings in one self in order to deal with the environment properly and efficiently.
Seventh, reviewing the previous session, how to write compassionate letters for yourself and others was taught. The method of teaching responsibility, an important component of teaching is self-compassion, where a person learns not to think critically about himself (be kind to himself instead of criticizing himself). The method of recording and keeping daily notes of real situations based on compassion and the individual's performance in that situation was also taught to the participants.
Eighth, the skills presented in the previous sessions were reviewed and practiced to help the participants cope with different life situations in different ways. After the summary, summarizing and practicing the skills taught in order to acquire skills in dealing with domestic violence

Results

This study consisted of three subjects. Their demographic information is given in Table 2.

Table 2. Demographic characteristics of the participants

Subject	age	marital status	education	occupation	location of pain	duration of pain
First	23	married	master's degree	housewife	waist	2 years
Second	27	married	bachelor	employee	neck	3 years
Third	33	married	diploma	housewife	shoulder/neck	5years

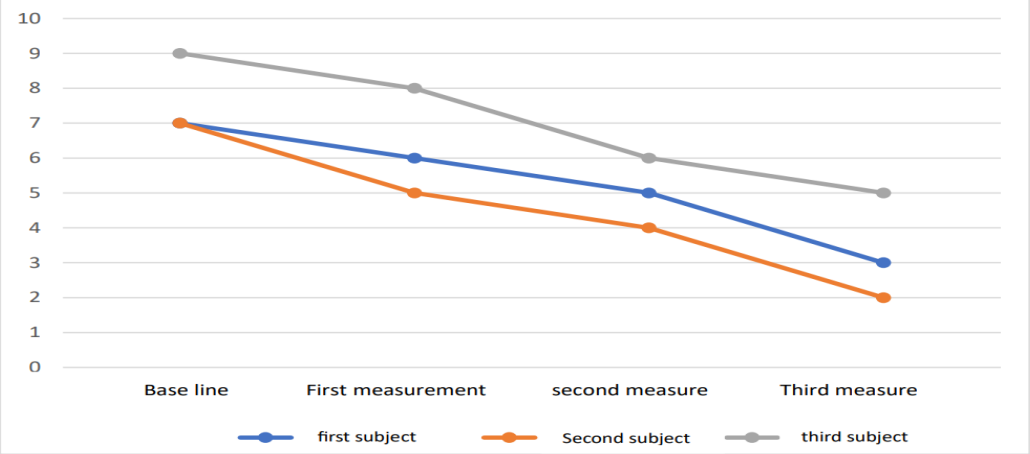
According to the obtained data, the subjects reported a decrease in pain intensity. According to the results obtained from the recovery percentage formula, the recovery values of the subjects after treatment are significant.

Table 3. Participants' scores in the baseline and treatment stages

Treatment steps	the first subject	The second subject	The third subject
Baseline	7	7	9
Second assessment (third session)	6	5	8
Third assessment (fifth session)	5	4	6
Fourth assessment (eighth session)	3	2	5
Recovery percentage	57/14	71/4	44/4

Table 4. Data overlap

Compare position	Baseline phase and measurement		
Subjects	First	Second	Third
PND	100	100	100
POD	0	0	0



Graph 1. The effect of self-compassion training in reducing the severity of chronic pain of subjects

The visual analysis of the data graph of three subjects is shown in graph 1. As can be seen in Figure 1, there was a significant reduction in chronic pain for all three subjects from baseline to the end of treatment. Therefore, teaching self-compassion has led to the reduction of chronic pain in three subjects.

Discussion

The present study was conducted with the aim of the effectiveness of self-compassion training on the severity of chronic pain in women subjected to domestic violence using a single-subject design. According to the results, self-compassion training was effective on the severity of chronic pain in women subjected to domestic violence. This finding was in line with the study of (Ahmadi et al., 2020). In addition, Wren et al., (2012) stated that self-compassion can lead to adaptation to chronic pain in patients.

In explaining this finding, it can be said that when a person can treat herself compassionately, she will enjoy more well-being and mental health. Self-compassion can be a strategy for emotion regulation. This means that by behaving compassionately towards oneself, one avoids experiencing unpleasant emotions and painful emotions are accepted in a compassionate way. As a result, pleasant emotions take the place of unpleasant emotions and new coping strategies are created (Allen and Leary, 2010).When a person has a compassionate acceptance approach instead of avoidance, he adopts more problem-oriented strategies. Therefore, this issue can play a role in reducing the pain experience (Neff, 2011; Arimitsu and Hofmann, 2015).

The relationship between pain and emotion has also been established at the neurobiological, psychological and social levels (MacDonald and Leary, 2005; Linton and Bergbom, 2011; Lumley et al., 2011).Lumley and colleagues (2011) reported that pain anxiety, fear of pain, and intense arousal of unpleasant emotions were associated with greater pain and poorer adjustment

And this research shows that there is a two-way relationship in which these emotional factors not only play a role in the response to pain, but also stimulate, maintain or intensify pain. Therefore, self-compassion is effective as an alternative method to regulate difficult emotions caused by pain-related problems.

An empirical study found that a greater ability to show self-compassion was associated with significantly less negative emotion and less likely to report avoidance, catastrophizing, and rumination in response to unpleasant self-related events (both pain and non-pain related). . Higher self-compassion was also associated with greater satisfaction with social participation (Purdie and Morley, 2015).

There is extensive literature showing that self-compassion is associated with greater acceptance of pain (Costa and Pinto-Gouveia, 2011). Wren et al. (2012) found that self-compassion did not affect participants' perception of pain (unpleasantness or intensity), but with lower levels of negative effect, higher levels of positive effect, lower levels of pain catastrophizing, and reported levels of It is associated with less pain than disability. When self-compassion replaces harsh self-criticism, kindness, and self-understanding and acceptance, instances of pain or failure will become more bearable.

Also, understanding one's experiences as part of the larger human experience, rather than seeing them as unique to oneself, and having painful thoughts and feelings in the mind's consciousness, rather than over-identifying with them (Scoglio et al., 2018). Can play a significant role in reducing the intensity of chronic pain. Based on this, teaching self-compassion can affect the severity of chronic pain in women under domestic violence. Preliminary evidence in people with chronic

pain suggests that the use of loving-kindness and compassion-based meditation can reduce pain intensity and moderate the impact of pain, reduce psychological distress, and increase pain acceptance (Chapin et al., 2014). In a sample of patients experiencing chronic migraines, a 20-minute mindfulness meditation significantly reduced pain and tension immediately following the meditation (Tonelli and Wachholtz, 2014). There is a high prevalence of self-critical thinking and shame in patients with chronic pain, which is often related to the impact of pain on maintaining valuable social roles and identities. Therefore, a therapeutic approach that helps people develop their capacity to respond compassionately to their pain and related problems and learn to self-soothe appears to be valuable.

Overall, the available evidence suggests that developing a style of responding to pain, difficulty, and failure that is compassionate, emphasizes shared humanity, and is independent of the need for valuing will be beneficial in working with chronic pain. The development of compassion is associated with improvements in emotion regulation, self-management, and the development of more adaptive coping strategies and responses to pain-related problems. Some studies have also shown that compassion can reduce the intensity of pain.

One of the limitations of this study is the special and unique conditions of the subjects because they were subjected to domestic violence. These conditions prevented them from being able to participate in the meetings easily and they continued their cooperation with difficulty. Considering that this study was conducted on married women, it is suggested that future researches should investigate self-compassion training in the group of single men and women. It is also suggested to compare this treatment with other treatments.

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No potential conflicts of interest are reported by the authors.

ORCID

Ezzatollah Ahmadi: https://orcid.org/0000-0002-6622-3624

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