

# The Effect of Some Demographic Variables on Self-Compassion among Women with Breast Cancer in Irbid

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## Abstract

Certain psychological and demographic factors and variables affect the level of self-compassion of women with breast cancer, justifying their needs to provide appropriate psychosocial and medical support that can help promote self-compassion and improve the life requirements of these women. The study aimed to identify the level of self-compassion among a sample of women with breast cancer in Irbid City. And recognize differences in self-compassion they have based on a number of related variables. The study sample consisted of 102 women with breast cancer, who were selected in the best way possible. To achieve the objectives of the study, the self-compassion scale prepared by Miqdadi (2020) was used. The significance of his sincerity and consistency was verified. The results showed that the arithmetic averages ranged between 2.57 and 3.61, and the field of common humanity came in first place with the highest arithmetic average of 3.61, while the field of autonomy came in last place with an arithmetic average of 2.57, and the arithmetic mean of the level of self-compassion among women with breast cancer as a whole was 3.15. The results showed an apparent variation in the arithmetic averages and standard deviations of the level of self-compassion among women with breast cancer due to variables (age, educational level, and duration of diagnosis), and the results showed no statistically significant differences due to the effect of age, educational level, and duration of diagnosis.

**Keywords:** Self-Compassion, Women with Breast Cancer.

## Introduction

Breast cancer Who is it? The most common cancer in women It is the most effective on an emotional and psychological level among women. (Jazayeri, Saadat, Ramezani, & Kaviani, 2015) This disease is the source of A major concern among legislators Health due to high mortality in female fertility (Daroudi et al., 2015) Women with breast cancer, especially in developing countries, are exposed to many physical and mental health problems, and the discovery of cancer is associated with more emotional and physical disorders. (Al-Azri, Al-Awisi, & Al-Moundhri, 2009) A woman's cancer affects various aspects of her life as a tangible event, and diagnosing and treating breast cancer for everyone is a very unpleasant and difficult experience. (Sarenmalm, Browall, Persson, Fall-Dickson, & Gaston-Johansson, 2013) and lead physical changes after breast cancer treatment into a long-term problem In addition to the lack of self-confidence and the negative repercussions on this category as a As a result of the total change in the shape of women after the injury and exposure to the treatment stage, which may last for a

short period of time and requires psychological and social support in an effort to maintain psychological and social balance and provide the requirements for that, the most prominent of these problems that may appear in this group is suffering from a poor ability to sympathize with oneself. The ability to be kind to oneself is an internal resource that may enhance a woman's ability to cope with these physical changes associated with cancer. (Przedziecki et al., 2013) Self-compassion is associated with mental health, and as an internal resource, it can help a woman undergo a lot of physical changes when exposed to them quickly and suddenly. (Roberts et al., 2009). Women with breast cancer are also exposed to various stressors, and self-care behaviors play an important role in how long they are required to recover. (Abdollahi, Taheri, & Allen, 2020) Self-compassion in women with breast cancer indicates their ability to be kind to themselves and happy while suffering from the disease and is an internal source that influences women's coping processes. (Raes, 2011) Self-compassion has been individually associated with reduced psychological distress in women with breast cancer, and self-compassion is also associated with reduced body

image. (Todorov, Sherman, Kilby, & Psycho-oncology, 2019) A number of studies have looked at the self-care behaviors of women with breast cancer. (Coughlin, Challenges, & Progress, 2019) And I knew (Neff, 2003) that "self-compassion involves a strategy of controlling emotions in which a person accepts himself with weaknesses and does not deny or suppress other negative experiences. Self-compassion consists of It has three main components: kindness to oneself (against autonomy), mindfulness of emotions (against transgression), and awareness of man's universal suffering (against isolation). As he knew (Alizadeh, Khanahmadi, Vedadhir, & Barjasteh, 2018) Self-compassion is a gentle way of treating oneself during difficulties, linked to the psychological adaptation of this group. and deals People with a high degree of empathy for themselves gently and attentively when faced with negative events, people with a high degree of self-compassion for stressful events, and people with self-empathy tend to rely heavily on positive cognitive restructuring, but they do not seem to differ from people who are less self-empathetic in the degree to which they approach problem solving and distraction, and the evidence does not show clear differences in the degree to which people with low empathy seek support as a coping strategy. With stress and adapting to it (Allen, Leary, & compass, 2010). Self-compassion helps In promotion Successful self-regulation of health-related behaviors involves reducing defensiveness, reducing emotional states and self-blame that interfere with self-regulation, and increasing compliance with medical recommendations. Since people cope better with stressful events, people with a high degree of self-compassion are less drained of illness and injury and therefore have greater self-regulation resources to devote to self-care. Framing and treating medical problems in ways that promote self-compassion may enhance people's ability to manage their health-related behavior and deal with medical problems. (Todorov et al., 2019). The process of self-compassion is achieved. A dynamic balance between compassionate versus uncompassionate ways in which individuals respond emotionally to pain and failure (with kindness or judgment), cognitively understand their predicament (as part of self-compassion) from human experience or isolation, and pay attention to suffering in a deliberate or exaggerated way (Neff, 2016). It also requires being kind and understanding towards yourself in situations of pain or failure rather than harshly self-critical; recognizing one's experiences as part of a larger human experience rather than seeing them as isolated; and retaining painful thoughts and feelings in conscious consciousness rather than over recognizing them. (Neff, 2003). as It is associated with positive and negative concepts; the negative, such as depression, blame, self-flagellation, despair, fear of failure, anxiety, etc.; and the positive, such as emotional intelligence and self-esteem. Wellbeing (Wilson, Weiss, Shook, & Differences, 2020) Self-compassion is a positive way to take care of oneself and deal with it gently when he goes through unpleasant and failed experiences, and if

they continue to happen, it will affect the nature of his life, leading to his feelings of pain and severe suffering. (Neff, 2009). as Includes Self-compassion: the ability to be open to and affected by one's suffering, experience feelings of self-concern and kindness, take an understanding and non-judgmental attitude toward one's shortcomings and failures, and recognize that one's experience is part of one's experience of shared human experience. (Neff, 2003). Has A variety of risk factors for breast cancer have been identified, including race, ethnicity, family history of cancer, genetic traits, as well as modifiable exposures such as increased alcohol consumption, physical inactivity, exogenous hormones, certain female factors, and reproductive factors. (Coughlin et al., 2019).

The second characteristic of self-compassion, shared humanity, involves recognizing that an individual's experiences, no matter how painful, are part of the shared human experience. During people's failure, loss or rejection, humiliation, or other negative events, they often feel that their experience is personal and unique, when in fact, everyone suffers from problems and suffering. Recognizing that one is not alone in this experience reduces people's feelings of isolation and enhances the ability to deal with Psychosocial adjustment pressures (Neff, 2003) as for Mindfulness is having a The individual has the ability to have self-pity and a willingness to turn towards and acknowledge pain. Mindfulness is a kind of balanced awareness that cannot be avoided. The individual must not escape from failed negative experiences and avoid them if he must confront and live them in the present moment in a balanced manner, and do not call them negative judgments. (Neff, 2016) Studies show that self-compassion is positively associated with indicators of self-well-being, where People with high self-compassion scores tend to score lower on measures of neuroticism and depression and higher on measures of life satisfaction, social cohesion, and self-well-being. (Neff & Kirkpatrick, 2007) The aim of the study carried out by Kearney & Hicks, 2017) was to recognize the effectiveness of self-compassion on women with breast cancer. Australia, co-study (23) women, and the results of the study indicated that self-compassion may be a protective factor in relation to hyperarousal, early onset, and disease progression. as carried out (Al-Azri et al., 2009) study With the aim of detecting The relationship between flexibility, self-compassion, social support, and a sense of belonging in women with breast cancer and demographic characteristics, such as age, type of surgery, stage of cancer, marital status, educational level, economic status, and lifestyle,. Co-study (150) of women with breast cancer, and their age ranged between 41-49 years. The results of the study showed that self-compassion was moderate and that self-compassion, social support, and a sense of belonging were effective in increasing resilience among women with breast cancer. The study aimed (Todorov et al., 2019) to identify self-compassion and hope in the context of body image disorder and distress in breast cancer survivors in Australia. Co-study (195) of women with breast cancer. The results of the



study showed that self-compassion and hope were inversely associated with all the results. In the Arab environment, he conducted Lanajiha (2019) to identify the level of self-compassion among mothers of children with Down syndrome, in addition to knowing the differences in self-compassion according to the variables of sex and age of the child, in addition to the educational level and age of the mother. Co-study (150) or from mothers of children with Down syndrome, and the results showed that mothers of children with Down syndrome have a relatively high level of self-compassion. It turns out there were no statistically significant differences in the level of self-compassion according to the variables of sex, the child's age, educational level, and the age of the mother. and studied (Abdollahi et al., 2020) Turn around self-compassion. lowering the level of perceived stress and self-care behaviors in women with breast cancer. A co-study (210) of women with breast cancer ranged in age between 27 and 60) years. The results of the study showed that self-compassion served as a mediator between perceived stress and self-care behaviors. Search as(Wei et al., 2023) Features of self-compassion and psychological outcomes in cancer patients and examination of associations of self-compassion features with social, demographic, medical, and psychological outcomes. In the study, 289 patients with heterogeneous cancers were selected from two hospitals in China. The results of the study indicated that there are five profiles for self-compassion: "Average empathy with oneself" (54%), "High self-compassion" (19.4%), "Low self-compassion and low self-coolness" (11.4%), "High self-compassion" (empathy and high coldness in the soul) (8%), and self-compassion and high coldness in the soul" (7.2%). Patients with a "high self-compassion" profile tend to be older and do not report cancer recurrence, and those with a "low self-compassion and low self-cooling" profile tend to be female. Patients with a "high self-compassion" profile reported the fewest symptoms of depression and anxiety, while patients with an "average" profile reported empathy, "self-cooling and self-cooling." About the most common symptoms of depression, Stork.

## Method

### Participants

The study population consisted of all women with

breast cancer registered in the Islamic Center Society in Irbid, north of the Hashemite Kingdom of Jordan, Irbid, during the study period from 2023 to 2024, and their number was 164 women who visited the center and received a number of psychological, material, and health benefits. The study sample consisted of (102) women with breast cancer, selected in the available way from (6) centers affiliated to the Islamic Center Society, all located in Irbid Governorate (north of the Hashemite Kingdom of Jordan), and all of them agreed to participate in the current study and answer the paragraphs of the scale after clarifying its objectives, and they achieved the conditions of participation, which were represented in achieving parity among them, in addition to not taking cancer-related treatment during the treatment period, and all of them lived the stage and journey of treatment during the last period and experienced feelings of infection with chronic diseases, and all of them are married women, and they visit the aforementioned centers periodically.

### Investment

#### Self-compassion scale

The self-compassion scale was used in women with breast cancer, developed by Miqdadi (2020), consisting of 18 items distributed over six dimensions: self-kindness, autonomy, shared humanity, isolation, mental alertness, and excessive autism. The scale has good psychometric properties, with a stability coefficient of 0.87 and a correlation coefficient between dimensions of 0.44-0.60.

#### Efficiency of the Psychometric Scale

##### Honesty

To extract the indications of the validity of the construction of the scale, the correlation coefficients of each paragraph and the total score, and between each paragraph and its association with the field to which it belongs, and between the fields with each other and the total degree by applying the tool to an exploratory sample similar to the current study sample consisting of (30) women with breast cancer, and the correlation coefficients of the paragraphs with the tool as a whole ranged between (0.55-0.79), and with the field (0.78-0.96) and Table 1 shows that all correlation coefficients were of acceptable degrees and statistically significant, and therefore Delete any of these paragraphs.

**Table 1: Correlation coefficients between paragraph, total score, and domain to which it belongs**

Paragraph number			Paragraph number			Paragraph number		
1	.94**	.76**	7	.92**	.70**	13	.96**	.75**
2	.85**	.79**	8	.96**	.74**	14	.89**	.69**
3	.92**	.75**	9	.94**	.75**	15	.96**	.68**
4	.89**	.55**	10	.91**	.55**	16	.93**	.71**
5	.85**	.67**	11	.94**	.65**	17	.92**	.70**
6	.78**	.56**	12	.85**	.72**	18	.83**	.58**

\* Statistically significant at the significance level (0.05); \*\*Statistically significant at the significance level (0.01).

Table 2 shows that all correlation coefficients were of acceptable degrees and statistically significant. It

is noted from the previous construction truthfulness indicators that all paragraphs reached their

correlation coefficient with the total degree of the scale, and the degree of the dimension was higher than (0.30), and a criterion was adopted for accepting the paragraph that its correlation

coefficient is not less than (0.30), according to what was referred to (Hattie, 1985), and thus accepting all paragraphs of the scale.

Table 2: Correlation coefficients between domains and total degree

	Self-kindness	Self	Common humanity	Isolation	Mental alertness	Excessive autism	Self-compassion scale
Self-kindness	1						
Self	.777**	1					
Common humanity	.839**	.771**	1				
Isolation	.793**	.801**	.793**	1			
Mental alertness	.799**	.793**	.861**	.820**	1		
Excessive autism	.400*	.722**	.798**	.836**	.870**	1	
Self-compassion scale	.814**	.705**	.775**	.703**	.728**	.741**	1

\* Statistically significant at the significance level (0.05); \*\*Statistically significant at the significance level (0.01).

## B. Stability

To verify the stability of the study tool, it was verified by (test-retest) applying the scale and reapplying it after two weeks on the survey sample from outside the study members consisting of 30, and then the Pearson

correlation coefficient was calculated between their estimates both times. Table 3 shows the stability coefficient by internal consistency using the Cronbach alpha equation, the repetition stability of the domains, and the total degree, and these values were considered appropriate for the purposes of this study.

Table 3: Cronbach alpha internal consistency coefficient, repetition stability of domains, and total degree

Domain	Replay stability	Internal consistency
Self-kindness	0.85	0.83
Self	0.86	0.84
Common humanity	0.81	0.77
Isolation	0.83	0.71
Mental alertness	0.82	0.79
Excessive autism	0.84	0.80
Self-compassion scale	0.89	0.86

## Results

### Arithmetic averages and standard deviations of the level of self-compassion in women with breast cancer.

Table 4 shows that the arithmetic averages have

ranged between 2.57 and 3.61, and in first place came the field of common humanity with the highest arithmetic average of 3.61, while the field of autonomy came in last place with an arithmetic average of 2.57, and the arithmetic mean was the total level of self-compassion in women with breast cancer (3.15), moderately.

Table 4: Arithmetic averages and standard deviations of the level of self-compassion in women with breast cancer (N = 102)

Rank	figure	Domain	Arithmetic mean	Standard deviation	Level
1	3	Common humanity	3.61	.933	
2	5	Mental alertness	3.60	.877	medium
3	1	Self-kindness	3.58	.863	
4	4	Isolation	2.80	.962	medium
5	6	Excessive autism	2.77	.769	
6	2	Self	2.57	.757	medium
		Self-compassion scale	3.15	.379	medium

### Differences in the level of self-compassion in women with breast cancer according to age variables, educational level, and duration of diagnosis

Table 5 shows an apparent variation in the arithmetic averages and standard deviations of the level of self-compassion among women with breast cancer due to different categories of variables (age, educational level, duration of diagnosis). To show the significance of statistical differences between arithmetic averages, triple variance analysis was used

to find out the effect of demographic variables (age, educational level, and duration of diagnosis) on the level of self-compassion among women with breast cancer, as shown in Table 6. There were no statistically significant differences due to the effect of age, where the value of P was 3.571 and a statistical significance of 0.062; and there were no differences due to the impact of educational level, where the value of P 1.681 and a statistical significance amounted to 0.198; as well as the absence of differences due to the effect of the duration of the diagnosis, where the value of P 2.858 and a statistical significance amounted to .094.

**Table 5: Arithmetic averages and standard deviations of the level of self-compassion in women with breast cancer attributed to certain demographic variables (age, educational level, duration of diagnosis)**  
The table below illustrates this.

		Arithmetic mean	Standard deviation	Number
lifetime	35 years and under	3.08	.277	36
	More than 35 years	3.20	.421	66
Education level	Bachelor or less	3.11	.390	48
	Graduate	3.19	.370	54
Duration of diagnosis	3 Years & Under	3.19	.367	52
	More than 3 years	3.11	.392	50

**Table 6: Analysis of the triple variance of age, educational level, and duration of diagnosis on self-compassion in women with breast cancer**

Contrast source	Sum of squares	Degrees of freedom	Average squares	P value	Statistical significance
lifetime	.498	1	.498	3.571	.062
Education level	.234	1	.234	1.681	.198
Duration of diagnosis	.398	1	.398	2.858	.094
Error	13.661	98	.139		
Total	14.530	101			

## Discussion

The above results showed that arithmetic averages the college level of self-compassion in women with breast cancer (3.15), which is moderate. The above result can be explained by the fact that breast cancer is one of the most important challenges and life difficulties. Facing Women Those who have gone through this experience and are optimistic about the future despite their anxiety and sometimes loss of hope. It can also be said that some women may resort to abandoning their life goals and responsibilities towards themselves and their families, and this shows their self-empathy to achieve Feeling safe, warm, and less stressed. This finding is consistent with the result of Abdollahi et al., (2020) which showed that self-compassion acted as a mediator between perceived stress and self-care behaviors, while this finding differs from the result of the Al-Nawajha study (2019), whose results showed a high level of self-compassion among mothers of children with Down syndrome. (Todorov et al., 2019) which indicated that self-compassion and hope were inversely associated with all outcomes.

The results of the differences in the degree of self-compassion among women suffering from cancer showed that there were no differences in all demographic variables (age, educational level, duration of diagnosis), and the above result may explain that the suffering of women with breast cancer aged less than 35 is equal to that of women aged 35 years and over, which affects their body image and shows greater self-empathy.

And that women with breast cancer do not show any interest in their level of education with their disease because it is not directly related to it, and this result can be explained as: Regardless of the educational level, cancer is bad and one of the most dangerous diseases that an individual can develop. Educational He did not change this fact, and this is confirmed by Sarenmalm et al., (2013) Cancer affects different aspects of a person's life as a tangible event, and diagnosing and treating breast cancer for everyone is extremely unpleasant and

a difficult experience. This result is consistent with the results of the study Al-Nawajha (2019), which showed no statistically significant differences in the level of self-compassion depending on educational level and age of the mother.

Perhaps the explanation for the absence of differences in the duration of diagnosis is due to moan The level of self-compassion as a whole Came in medium grade, Which means self-compassion, the ability to be kind to oneself, is an internal resource that may enhance a woman's ability to cope with these physical changes associated with cancer. (Przedziecki et al., 2013). And maybe because they have been influenced by past experiences, interactions, and contact with others in stages of their lives with the passage of time from contracting this disease, women adapt and accept living with their infection, and won't they be more concerned with their physical health than the duration of the diagnosis and breast cancer? This finding is consistent with the results of Alizadeh et al., (2018)

The above results may explain that the ability to understand the degree of self-compassion in women with breast cancer can be an important focus of their emotional and psychological support during their experience. Satisfactory as well as that support level. Social What they get from family, friends, and society can greatly affect their self-empathy., where social support contributes to a sense of self-confidence and the ability to cope with challenges (Hoffman & Baker, 2023) In addition, the role of the center in which the study was conducted in providing psychological services such as: Psychological guidance and counseling: Receiving psychological support and counseling can help develop self-compassion strategies and deal effectively with psychological and emotional challenges, as it can be said that some personal psycho-emotional factors, such as the level of self-confidence, optimism, and the ability to deal with psychological and emotional stress, knowledge, and education in the sense of understanding more about cancer, its treatment, and its potential effects, can help women empathize with themselves and



accept the changes that may occur, in addition to the role of cultural and religious factors. In building cultural and religious values and beliefs And she has an important role in how women interpret their experiences and how to deal with them. as It can be said that the experiences of women with breast cancer may be varied and depend on many factors. Provide comprehensive and multifaceted support and care to meet their individual needs and improve their psychological and emotional quality of life. In confirmation of the above, psychosocial and medical support play an essential role in improving the quality of life and coping with the psychological and emotional challenges that women with breast cancer may face, regardless of their level of education. Self-compassion may be a stable personality trait that is not affected by educational level, and it can also have an indirect effect on self-compassion through other factors such as social support and adaptive skills. (Hoffman & Baker, 2023; Neff, 2003; K. Neff, 2023; Todorov et al., 2019; Wilson et al., 2020)

## Recommendations

Based on the results of the study,

1. Designing a counseling program based on one of the theories of psychological counseling that contributes to psychological and social support for this group.
2. Conducting workshops concerned with enhancing the skills and levels of mental health of women with breast cancer and how to deal with life pressures through periodic meetings and preventive, curative, and rehabilitative programs provided by psychiatric services centers for this category.
3. Directing decision-makers who specialize in providing psychological, social, and family support programs to activate counseling programs for all family members affected by this type of cancer.

## Conflict of Interest

The authors declare that the research was conducted without any commercial or financial relationships that could be deemed a potential conflict of interest.

## Data Availability

Data will be made available on request.

## References

- Abdollahi, A., Taheri, A., & Allen, K. A. J. P. o. (2020). Self-compassion moderates the perceived stress and self-care behaviors link in women with breast cancer. 29(5), 927-933.
- Al'Azri, M., Al'Awisi, H., & Al'Moundhri, M. J. T. b. j. (2009). Coping with a diagnosis of breast cancer literature review and implications for developing countries. 15(6), 615-622.
- Alizadeh, S., Khanahmadi, S., Vedadhir, A., & Barjasteh, S. J. A. P. j. o. c. p. A. (2018). The relationship between resilience with self-compassion, social support and sense of belonging in women with breast cancer. 19(9), 2469.
- Allen, A. B., Leary, M. R. J. S., & compass, p. p. (2010). Self-Compassion, stress, and coping. 4(2), 107-118.
- Al-Nawajah, Zuhair. (2019). Compassion in particular among mothers of children with Down syndrome in the Gaza Strip. Islamic University Journal for Educational and Psychological Studies, 27 (3), 217-239.
- Coughlin, S. S. J. B. C. M., Challenges, D. R., & Progress. (2019). Epidemiology of breast cancer in women. 9-29.
- Daroudi, R., Sari, A. A., Nahvijou, A., Kalaghchi, B., Najafi, M., & Zendehtdel, K. J. I. j. o. p. h. (2015). The economic burden of breast cancer in Iran. 44(9), 1225.
- Hattie, J. J. A. p. m. (1985). Methodology review: assessing unidimensionality of tests and ltenls. 9(2), 139-164.
- Hoffman, C., & Baker, B. J. A. T. H. M. (2023). Effects of Mindful Self-Compassion Program on Psychological Well-being and levels of Compassion in people affected by Breast Cancer. 29, 36-41.
- Jazayeri, S. B., Saadat, S., Ramezani, R., & Kaviani, A. J. C. e. (2015). Incidence of primary breast cancer in Iran: Ten-year national cancer registry data report. 39(4), 519-527.
- Kearney, K., & Hicks, R. E. J. P. (2017). Self-compassion and breast cancer in 23 cancer respondents: Is the way you relate to yourself a factor in disease onset and progress? , 14-16.
- Miqdadi, Amna. (2020). The predictive ability of self-compassion, cognitive biases, and attachment styles for narcissistic personality disorder among Yarmouk University students. [Doctoral dissertation], Yarmouk University, Jordan.
- Mansouri, Laila and Galati, Bashir. (2022). Psychological trauma for women with breast cancer - a field study - Journal of Human and Social Studies, 11 (1), 273- 288.
- Neff. (2003). The development and validation of a scale to measure self-compassion. 2(3), 223-250.
- Neff. (2009). Self-compassion versus global self-esteem: Two different ways of relating to oneself. 77(1), 23-50.
- Neff. (2016). The self-compassion scale is a valid and theoretically coherent measure of self-compassion. 7, 264-274.
- Neff, & Kirkpatrick. (2007). Self-compassion and adaptive psychological functioning. 41(1), 139-154.
- Neff, K. (2023). Self-Compassion: Theory and Measurement. In *Handbook of Self-Compassion* (pp. 1-18): Springer.
- Przedziecki, A., Sherman, K. A., Baillie, A., Taylor, A., Foley, E., & Stalgis-Bilinski, K. J. P. o. (2013). My changed body: breast cancer, body image, distress and self-compassion. 22(8), 1872-1879.
- Raes, F. J. M. (2011). The effect of self-compassion on the development of depression symptoms in a non-clinical sample. 2, 33-36.
- Sarenmalm, E. K., Browall, M., Persson, L. O., Fall' Dickson, J., & Gaston-Johansson, F. J. P. o. (2013). Relationship of sense of coherence to stressful events, coping strategies, health status, and quality of life in women with breast cancer. 22(1), 20-27.
- Todorov, N., Sherman, K. A., Kilby, C. J., & Psycho-oncology, B. C. N. A. J. (2019). Self-compassion and hope in the context of body image disturbance and distress in breast cancer survivors. 28(10), 2025-2032.
- Wei, L., Xie, J., Wu, L., Yao, J., Zhu, L., & Liu, A. J. P. O.

(2023). Profiles of self-compassion and psychological outcomes in cancer patients. 32(1), 25-33.

Wilson, J. M., Weiss, A., Shook, N. J. J. P., & Differences, I. (2020). Mindfulness, self-compassion, and savoring: Factors that explain the relation between perceived social support and well-being. 152, 109568.