

Behavioral Therapy in Post Menopause Patients with Urine Incontinence Problems – Systematic Review

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Abstract

A journal search was carried out used the keywords "Postmenopausal women AND Cognitive Behavioral therapy AND urinary incontinence AND meta analysis" to collect relevant articles published in the last 10 years from five databases (ProQuest, PubMed, Science Direct, Ebsco and Google Scholar. Criteria inclusions were: nurses, patients, urinary incontinence, intervention, full text articles, studies that focused on nursing assessment, and written in English. Six journal articles were selected and analyzed using PICO. Results, Non-pharmacological therapy with a behavioral therapy approach with the application of MBSR (Mindfulness based stress reduction) and HEP (Health Enhancement program) as well as Yoga Therapy & PFMT (Pelvic Floor Muscle Training) exercises combined with light physical exercise such as walking, cycling, swimming. for 30 minutes as well as diet modifications can help postmenopausal patients with urinary incontinence. Conclusion: The application of MBSR (Mindfulness based stress reduction) and HEP (Health Enhancement program) as well as Yoga Therapy & PFMT (Pelvic Floor Muscle Training) exercises combined with light physical exercise such as walking, cycling, swimming for 30 minutes and diet modification can reduces the number of episodes of urine leakage and improves all types of urinary incontinence problems as well as quality of life and can be beneficial for sexual function in post menopausal women.

Keywords: Post Menopause Women, Cognitive Behavioral Therapy, and Urinary Incontinence

Introduction

Menopause is a process of permanent cessation of menstrual periods which can be categorized into premenopausal, premenopausal and postmenopausal stages which can occur naturally within the age limit of 42-68 years or which is induced by various symptoms of menopause. Menopause is a critical period in every woman's life which can cause metabolic changes and can affect women's health due to hormonal and metabolic changes, one of which is urinary incontinence (Kołodyska, Zalewski, & Rożek-Piechura, 2019).

Urinary incontinence is a complaint of involuntary leakage of urine. Urinary incontinence is classified by the International Urogynecological Association (IUGA) and the International Continence Society (ICS), into three types: Stress UI (SUI), Urge UI

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(UII), and Mixed UI (MUI) (Rutkowska, Salvalaggio, Rutkowski, & Turolla, 2022). The prevalence of urinary incontinence and other lower urinary tract symptoms increases after menopause and affects between 38% and 55% of women over 60 years of age (Russo et al., 2021). The increase in the prevalence of urinary incontinence in post-menopause is caused by changes in hormone levels in post-menopausal women (Xue, Palmer, & Zhou, 2020).

Urinary incontinence has many physical, mental and social effects on women's lives, especially in post-menopause which can reduce quality of life and sexual dysfunction (Batmani, Jalali, Mohammadi, & Bokaei, 2021). Rapid social development can affect a person's lifestyle of not moving much, and lack of time for physical activity or sports, which can cause muscle or bone weakness and blood circulation problems which can affect pathology and body dysfunction which can cause urinary incontinence in post-menopausal women (Kołodziejka et al., 2019).

Post-menopause can affect women's physiological and psychosocial quality of life. The health education intervention strategy is an alternative strategy that can improve attitudes and overcome symptoms of urinary incontinence in post menopause which can improve the health behavior of patients and families by changing lifestyles that threaten their health. Interventions that can be carried out to overcome the problem of urinary incontinence are identifying and treating modifiable factors by modifying lifestyle/behavior, pelvic floor muscle training and medications to support the urethra in increasing capacity. bladder (Aoki et al., 2017);(Lukacz, Santiago-Lastra, Albo, & Brubaker, 2017).

Research Methods

This study is a systematic review which is used as an introduction to a systematic review, studies related to behavioral therapy in post-monopausal patients with urinary incontinence problems. The stages in carrying out a systematic review that must be carried out are focused review with eligibility criteria, creating a search strategy, identifying literature and selecting using the PRISMA Flowchart flow diagram, data extraction, as follows: The journal search included articles published in the five year period between 2017 and 2021. The literature review focused on quantitative studies, full text articles, with a focus on Behavioral Therapy in Post-Menopause patients with Urinary Incontinence problems. Selected articles written in English were considered for analysis.

The latest articles about Behavioral Therapy in Post-Menopause patients with Urinary Incontinence problems were obtained from the Ebsco, PubMed, ProQuest, Scindirect and Google Scholar databases. The keywords used in the search were "Postmenopausal women AND Behavioral therapy AND urinary incontinence AND meta analysis" to identify Behavioral Therapy in Post-Menopausal patients with Urinary Incontinence problems. From the search, 339 titles were obtained from ProQuest, 229 titles from Scindirect, 125 titles from PubMed and 3,320 titles from Google Scholar. A total of 4,013 articles were found.

Analysis of articles in the database was carried out using article selection criteria based on the PICO approach (P– PostMenopausal patients with Urinary Incontinence problems; I– interventions made using Behavioral Therapy; C= 0; O– expected results related to the effectiveness of Behavioral Therapy), with a diagram PRISMA flow (Figure 1) 3,950 of the 4,013 selected articles were excluded, because they did not include the last 5 years found in the search process. 27 articles were removed from 63 articles due to the results of filtering academic journal articles, 30 articles from 36 were excluded because they were not suitable Document type: evidence-based articles and health care and the final search process found 6 relevant articles.

The Prisma Flowchart is used to describe in detail and transparently the PRISMA literature identification process. PRISMA is Preferred Reporting Items for Systemtic Reviews and MetaAnalyses, developed for authors reporting Systematic Reviews (SR) and Meta Analyses (MA). This search produced 6 the main article which was the focus of the analysis in the 2017-2022 period. The article uses a control group with an observation group to obtain an intervention. There were three research articles with an RCT research design, two research article with Meta analysis & RCT design, and one research articles with case reports. The mapping process was carried out based on domain.

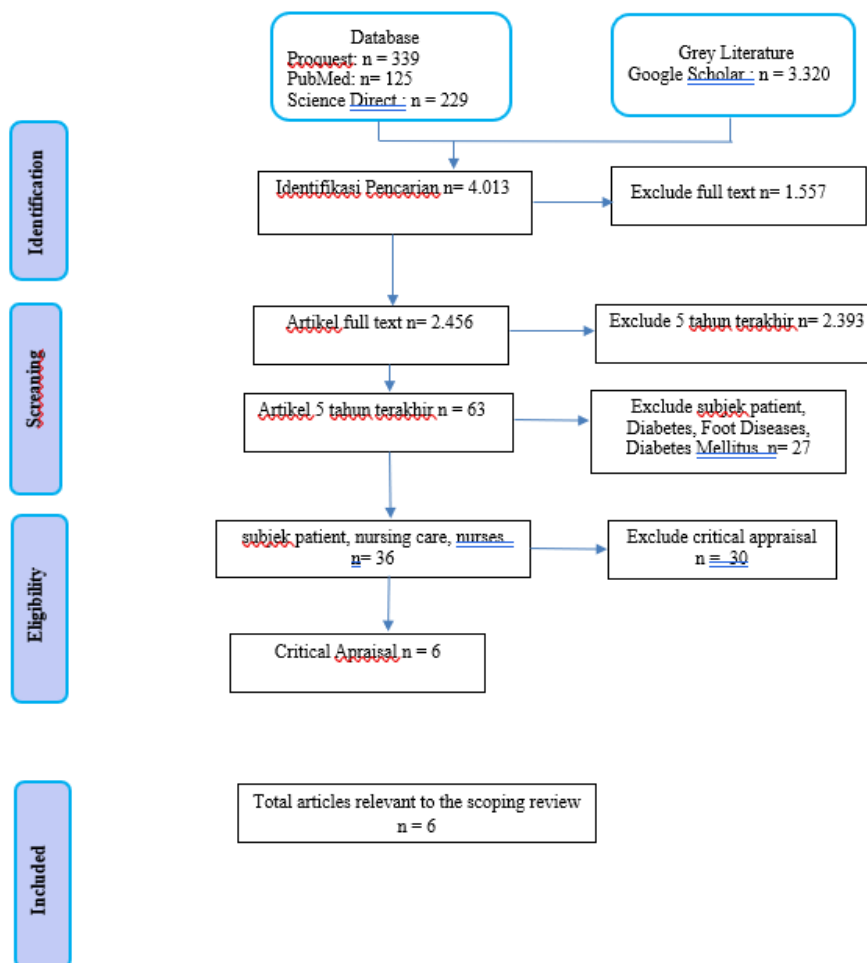


Figure 1. PRISMA flow diagram

Results and Discussion

Table 1 of previous research

No	Writer	Design Study	Main Findings	Domain
1	Maria del Carmen Carcelén-Fraile et al., (2020)	Meta Analysis & RCT	Pelvic floor muscle training is the most common exercise that can be beneficial for sexual function, but can be combined with a positive body mind so that it can improve the impact of menopausal symptoms on the quality of sexual life.	Quality of Sexual Health “Satisfaction”
2	Nguyen et al., (2020).	Meta Analysis & RCT	Yoga & PFMT (Pelvic Floor Muscle Training) therapy can reduce the number of urine leakage episodes and improve all types of urinary incontinence problems as well as quality of life in postmenopausal women can be beneficial for sexual function. PFMT therapy can be combined with walking for 30 minutes, aerobic training and independent exercise programs such as swimming, running, cycling, which can improve the quality of life of postmenopausal patients.	Quality of Life “Exercise”
3	(Katarina, F. F., & Supiano, (2019)	RCT	The use of MBSR (Mindfulness based stress reduction) and HEP (Health Enhancement program) in post-menopausal women can treat Urge Urinary Incontinence in post-menopausal patients	Quality of Life “Physical”
4	Hsiang-Tai Chao, et al., (2022)	RCT	Implementation of the PFMT (pelvic floor muscle training) and Yoga program can reduce symptoms due to Genitourinaria and improve the quality of life of post-menopausal patients	Quality of Life “Exercise”
5	Etnan M Balk, et al., (2019)	Meta Analysis	Non-pharmacological therapy with a behavioral therapy approach combined with pharmacological therapy can help postmenopausal patients with urinary incontinence	Quality of Life “Cognitif”
6	Lisa J. Rogo-Gupta, et al., (2022)	RCT	Diet modification is an effective intervention in the prevention and treatment for postmenopausal patients in the mechanisms of urinary tract symptoms that have a major impact on health.	Quality of Life “Cognitif”

Urinary incontinence is a complaint of involuntary leakage of urine. Urinary incontinence is classified by the International Urogynecological Association (IUGA) and the International Continence Society (ICS), into three types, namely Stress UI (SUI), Urge UI (UUI), and Mixed UI (MUI) (Rutkowska et al., 2022). Stress UI (SUI), can be defined as involuntary leakage of urine during activities such as coughing, sneezing, or laughing that can increase abdominal pressure. Urge urinary incontinence (UUI) is the involuntary leakage of urine resulting from a strong urge with a sudden and difficult to delay urge to urinate (commonly referred to as “overactive bladder”). These two subtypes are so common that they often appear together as a combination of symptoms referred to as mixed urinary incontinence (MUI) (Radzimińska et al., 2018).

Urinary incontinence can be caused by bladder pressure being lower than the closing pressure of the urethra and incontinence can occur due to decreased function of

the bladder or urethra, resulting in urine leakage. Low estrogen production during and after menopause produces symptoms from the autonomic nervous system that can cause urinary incontinence (Khan, Ansari, Vasenwala, & Mohsin, 2017). Menopause and aging are strongly associated with worsening lower urinary tract dysfunction.

The lower urinary tract shares embryological origins with the female reproductive system and is thus sensitive to the effects of steroid hormones. Sex steroid hormones have an important role in the regulation of lower urinary tract function and estrogen, androgen and progesterone receptors are expressed throughout the lower urinary tract, particularly in structures directly related to urinary continence such as the urethra, vagina and pelvic floor. muscles, fascia and ligaments (del Carmen Carcelén-Fraile et al., 2020).

Urinary incontinence in post-menopause can affect physical, emotional and social changes in women's lives which can affect women's quality of life and sexual dysfunction (Balk et al., 2019). The quality of life of patients with incontinence can be applied to cognitive-behavioral therapy interventions as an alternative or complementary treatment option to reduce the frequency and intensity of menopausal symptoms with urinary incontinence problems (Chao et al., 2022).

Cognitive behavioral therapy can identify negative thoughts and beliefs about menopause and aging, modify dysfunctional cognition to improve mood, sleep and quality of life (Katarina, F. F., & Supiano, 2019);(Felsted & Supiano, 2019). The use of effective cognitive-behavioral therapy can help reduce menopausal symptoms. The use of MBSR (Mindfulness based stress reduction) and HEP (Health Enhancement program) in postmenopausal women can treat urinary incontinence in postmenopausal patients (Katarina, F. F., & Supiano, 2019).

Increasing emotional regulation strategies by training awareness and attention to reflect on the past and worry less about the future as well as non-judgmental awareness of current physiological and psychological conditions and paying attention are actions that can help patients adapt to various circumstances of their current conditions. Helping free people from despair and panic and freeing them from suffering can increase changes in the patient's attitude and perspective in seeing their health problems without allowing fear (Rogo-Gupta et al., 2022).

Other non-pharmacological therapy can be provided by recommending Yoga & PFMT (Pelvic Floor Muscle Training) Therapy exercises combined with light physical exercise such as walking, cycling, swimming for 30 minutes and diet modification can reduce the number of episodes of urine leakage and improve all types of urinary incontinence problems as well as quality of life in postmenopausal women can be beneficial for sexual function (Nguyen et al., 2020);(Charandabi et al., 2015).

Conclusion

Urinary incontinence can affect post-menopausal women, which has a negative impact on physiological and psychological changes. Urinary incontinence in post menopause can limit physical activity, work or sexual needs. Identifying the cause and type of incontinence can help in choosing therapy. Non-pharmacological therapy with a

behavioral therapy approach combined with pharmacological therapy can help post-menopausal patients with urinary incontinence. Behavioral-Cognitive Therapy with the application of MBSR (Mindfulness based stress reduction) and HEP (Health Enhancement Program) as well as Yoga Therapy & PFMT (Pelvic Floor Muscle Training) exercises combined with light physical exercise such as walking, cycling, swimming for 30 minutes and Diet modification can reduce the frequency of urine leakage and improve all types of urinary incontinence problems as well as quality of life and can be beneficial for sexual function in post-menopausal women.

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