

A Pre-Experimental Study to Assess the Effectiveness of Structured Teaching Programme on Knowledge Regarding Osteoporosis among Menopausal Women in Selected Community Areas of District Amritsar, Punjab

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ABSTRACT

Menopause is a natural life phase. Menopause is as important to the female life cycle as menstruation and pregnancy, which has always been misunderstood in our culture. Just as menstruation begins to signify the transformation of a woman from a girl to a woman, menopause means the transfer of a woman from a wise woman to a wise elder. A woman's body begins to prepare for menopause at the age of forty. As many smart women have found out, this is much more than the physical change from childhood to free childhood. **AIM:** The aim of the study was to evaluate the effectiveness of structured teaching programme on knowledge regarding osteoporosis among menopausal women in selected community areas of District Amritsar, Punjab. **METHODS:** A pre-experimental study was conducted to evaluate the effectiveness of structured teaching programme on knowledge regarding osteoporosis among menopausal women. A total of 60 menopausal were selected using convenient sampling technique. Data were collected through self-structured questionnaire. The pre-test was performed and structured teaching programme was executed following the post-test. **RESULTS:** The study results found that 48.3% had good knowledge, 45% had average knowledge, while just 6.7% had excellent knowledge regarding osteoporosis among menopausal women. Post-test scores; 41.7% women had good knowledge, while 36.7% had excellent knowledge, and 21.7% had average knowledge regarding osteoporosis among menopausal women. The mean distance is 7,583. The computed t-value is 7,086, p-value 0.001, highly significant at 1%. This shows that the structured teaching programme is effective in increasing the knowledge of menopause women about osteoporosis. In addition, association of socio-demographic variables education status ($p=0.005$), and dietary patterns ($p=0.044$), were shown to be significant at 5 %. **CONCLUSIONS:** The study concluded that structured teaching programme had significant effect on knowledge of menopausal women in community regarding prevention of osteoporosis.

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KEYWORDS: Menopause, Women, Osteoporosis, Knowledge, Structured teaching Programme.

Background of study:

Women's health directly affects the nation's health. Women's health has been a significant issue in developed countries in recent years as a result of declining quality of life. Although India has made

significant progress in recent decades in terms of social and economic growth, such as increases in life expectancy, child mortality, and literacy, it has lagged behind in terms of improving women's health.¹ The

change of women from reproductive to non-reproductive status is caused by a significant decrease in female hormonal secretion by the ovaries. This process is typically gradual and gradual, develops over a number of years, and is a common part of ageing referred to as menopause.²

MATERIAL AND METHODS

Study design: A pre experimental research design was used to plan and organize the present study

Study setting: The study was conducted on menopausal women at selected community areas of villages Bal Bawa and Fatahpur, Amritsar, Punjab.

Study subjects: Total 60 menopausal women at selected community areas of villages Bal Bawa and Fatahpur, Amritsar, Punjab.

Inclusion criteria

The study includes the menopausal women who are:

- Menopausal women who were willing to participate in the study.
- Menopausal women who can read/understand English or Punjabi language.

Exclusion criteria

The study excludes the menopausal women who are:

- Menopausal women who were not willing to participate in the study.
- Menopausal women who were not mentally healthy.

Sampling: Purposive sampling technique was used to select the sample.

Study instrument: Self structured questionnaire tool was used to assess the effectiveness of STP on knowledge regarding osteoporosis among menopausal women in selected community areas.

Ethical consideration: the permission was taken from ethical committee of Shri Guru Ramdas

College of Nursing Institute, Pandher, Amritsar. Prior to data collection, written permission was obtained from the concerned authority of selected community areas, Amritsar. Apart from this, written informed consent was taken from each study subject and permission was taken from authorities of the respected area to collect the data. Confidentiality & privacy of the study subjects was also maintained.

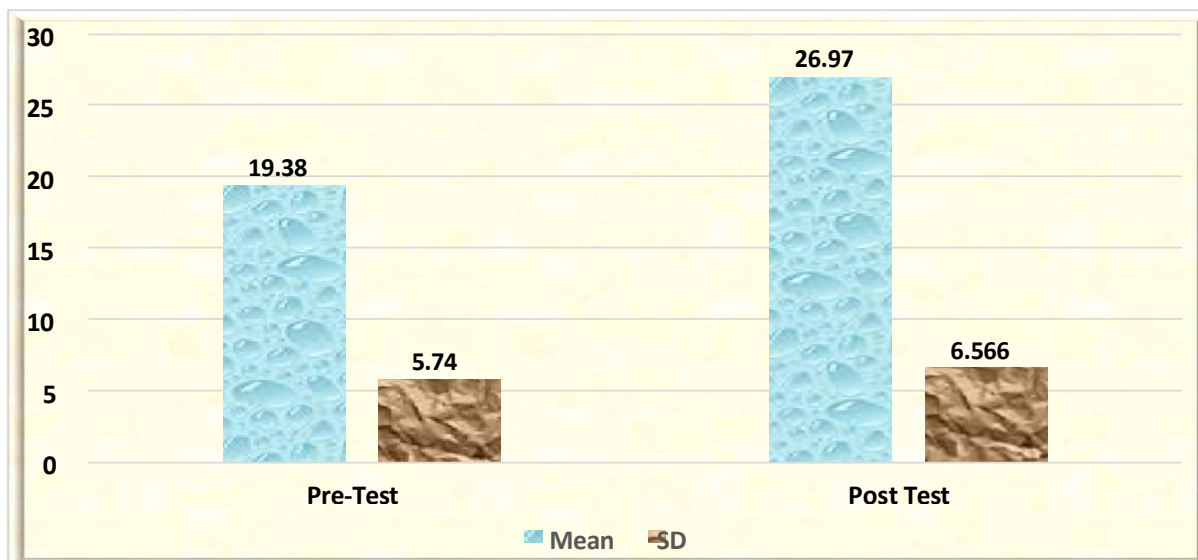
Pilot study:

Pilot study was conducted to ensure the reliability of the tool and feasibility of the study. The pilot study was conducted on 6 subjects. The pilot study was conducted at rural community area, village Bal Bawa, Amritsar.

Data collection: An informed written consent was taken from the participants, Amritsar, Punjab. Purposive sampling technique was used for data collection.

Data analysis: Analysis of the data was done in accordance with the objectives. It was done by using the descriptive and inferential statistics i.e by calculating frequency, percentage distribution mean and inferential statistics (Chi square test, paired t – test) was used to assess the effectiveness of structured teaching programme on knowledge regarding osteoporosis among menopausal women

Results: shows that in comparison of pre test knowledge and post test knowledge score regarding osteoporosis among menopausal women, the mean score has increased in the post test. The mean difference is 7.583. Though it was seen that the post-test knowledge score was more than the pre-test knowledge score, it is essential to put it under statistical significance. So suitably the paired „t“-test was chosen and worked out. The calculated t-value is 7.086, p value 0.001 which is highly significant at <0.01 level.



CONCLUSION AND RECOMMENDATION

Conclusion of the study: The study concluded that structured teaching programme was effective in increasing knowledge of women regarding menopause.

Recommendations:

- A comparative study with a control group is recommended.
- A comparative study of menopausal women in rural and urban areas may be undertaken.
- The analysis may be repeated on a broad sample size and in a variety of contexts, allowing for the generalisation of results over a large population.
- A training module may be built to convey information about osteoporosis prevention and management.
- A study may be conducted to ascertain nurses' and health workers' involvement in conducting health education and awareness programmes for various segments of the community.
- A comparable study may be conducted using a true experimental design.

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Nil

CONFLICTS OF INTEREST

There are no conflicts of interest.

REFERENCES

- [1] Quattrini S, Pampaloni B, Gronchi G, Giusti F, Brandi ML. The Mediterranean Diet in Osteoporosis Prevention: An Insight in a Peri- and Post-Menopausal Population. *Nutrients*. 2021 Feb; 13(2):531-537.
- [2] Santosh L. A Comparative Study to Assess the Effectiveness of Planned Teaching Programme on Knowledge Regarding Prevention of Osteoporosis Among Post-Menopausal Women in Selected Rural and Urban Areas, Bangalore. *Galore International Journal of Health Sciences and Research*. 2020; 5(3):1-6.
- [3] Shawashi TO, Darawad M. Osteoporosis Knowledge, Beliefs and Self-efficacy Among Female University Students: A Descriptive Study. *The Open Nursing Journal*. 2020 Oct 15; 14(1). Available from: <https://opennursingjournal.com/VOLUME/14/PAGE/211/>
- [4] John Cecily HS. Early Detection and Prevention of Osteoporosis Among Pre- and Postmenopausal Women in Saudi Arabia. *Clinical nursing research*. 2020 Jan; 29(1):48-55.
- [5] Naik-Panvelkar P, Norman S, Elgebaly Z, Elliott J, Pollack A, Thistlethwaite J, Weston C, Seibel MJ. Osteoporosis management in Australian general practice: an analysis of current osteoporosis treatment patterns and gaps in practice. *BMC family practice*. 2020 Dec 1; 21(1):32.
- [6] Afshari F, Bahri N, Sajjadi M, Mansoorian MR, Tohidinik HR. Menopause uncertainty: the impact of two educational interventions among women during menopausal transition and beyond. *PrzeglądMenopauzalny= Menopause Review*. 2020 Mar; 19(1):18.
- [7] Smail L, Jassim GA, Sharaf KI. Emirati Women's Knowledge about the Menopause and Menopausal Hormone Therapy. *International Journal of Environmental Research and Public Health*. 2020 Jan; 17(13):4875.
- [8] Ghelichkhani F, Mirghafourvand M, Bahrami-Vazir E, Vali E, Mohammadi A. Self-efficacy of osteoporosis preventive behaviors and its predictors in Iranian adolescents. *International journal of adolescent medicine and health*. 2018 Oct 20; 1. Available from: <https://www.degruyter.com/document/doi/10.1515/ijamh-2018-0038/html>
- [9] Quattrini S, Pampaloni B, Gronchi G, Giusti F, Brandi ML. The mediterranean diet in osteoporosis prevention: An insight in a peri- and post-menopausal population. *Nutrients*. 2021 Feb; 13(2):531. Available from: <https://pubmed.ncbi.nlm.nih.gov/33561997/>
- [10] Modi A, Ebeling PR, Lee MS, Min YK, Mithal A, Yang X, Sajjan S. Medication use patterns, treatment satisfaction, and inadequate control of osteoporosis study in the Asia-Pacific region (MUSIC OS-AP): design of a multinational, prospective, observational study examining the impact of gastrointestinal events on osteoporosis management in postmenopausal women. *Bone reports*. 2015 Dec 1; 3:61-6. Available from: <https://www.sciencedirect.com/science/article/pii/S23521872153000>
- [11] Patni R. Normal BMD values for Indian females aged 20–80 years. *Journal of mid-life health*. 2010 Jul; 1(2):70. Available from: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3122499/>
- [12] Kadam NS, Chiplonkar SA, Khadilkar AV, Khadilkar VV. Prevalence of osteoporosis in apparently healthy adults above 40 years of age

- in Pune City, India. Indian journal of endocrinology and metabolism. 2018 Jan; 22(1):67. Available from: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC5838914/>
- [13] Babhulkar S, Seth S. Prevalence of osteoporosis in India: an observation of 31238 adults. Int J Res Orthop. 2021 Mar; 7(2):362-368. Available from: file:///C:/Users/DELL/Downloads/Prevalence_of_osteoporosis_in_India_an_observation.pdf
- [14] Pande K, Pande S, Tripathi S, Kanoi R, Thakur A, Patle S. Poor knowledge about osteoporosis in learned Indian women. JAPI. 2005 May 30; 53(1). Available from: <https://pubmed.ncbi.nlm.nih.gov/16124350/>
- [15] Tella SH, Gallagher JC. Prevention and treatment of postmenopausal osteoporosis. The Journal of steroid biochemistry and molecular biology. 2014 Jul 1;142:155-70. <https://www.sciencedirect.com/science/article/abs/pii/S0960076013001829>

