

Associating Factors of Osteoporosis in Postmenopausal women at Vajira Hospital.

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Abstract

Background and objective: Prevalence of postmenopausal osteoporosis is increasing. Osteoporosis increases the chance of fractures which increased morbidity and mortality rates. This study aims to studies 3 risk factors for osteoporosis; age, body mass index (BMI), age at menopause. **Methods:** This cross-sectional study in postmenopausal women was evaluated for bone mineral density using Dual-energy X-ray absorptiometry at nuclear medicine department in Vajira hospital from January 2012 to December 2012. A total of 1,201 women were enrolled, 494 with osteoporosis and 707 without osteoporosis. Use criteria for the diagnosis of osteoporosis according to WHO criteria. Records of baseline data and risk factors; age, BMI, and menopause age, were collected from DXA. **Results:** Factors of age, BMI, and menopause age have significant associations with the incidence of osteoporosis in postmenopausal women. In the Crude Odds ratio analysis, the age groups 60-69, 70-79, and 80 more at risk of developing osteoporosis than 1.627, 2.365, and 5.808 times, respectively, compared to the reference age group of 50-59 years old. BMI group underweight (<18.5) and normal (18.5-23) more at risk of developing osteoporosis were 5.895, 1.933 times, respectively, compared to the reference Overweight group (>23). When women age, the menopause increases 1 year. will result in a decrease in osteoporosis by 2.1 percent. In the Adjust Odds ratio analysis, the age groups 60-69, 70-79, and 80 more at risk of developing osteoporosis than 1.830, 2.687, and 6.028 times, respectively, compared to the reference age group of 50-59 years old. BMI group underweight (<18.5) and normal (18.5-23) more at risk of developing osteoporosis were 5.467, 2.002 times, respectively, compared to the reference Overweight group (>23). When women age, the menopause increases 1 year. will result in a decrease in osteoporosis by 2.3 percent. **Conclusion:** Factors of age, body mass index (BMI), and menopause age. There was a statistically significant association with the incidence of osteoporosis in postmenopausal women.

Keywords: Associating Factor, Osteoporosis, Postmenopausal women, Bone mineral density