Housing conditions and occurrence of osteoporosis

J-J. WU, B-J. LIANG, Z-W. CHEN. Association between housing conditions and occurrence of osteoporosis among the elders aged 60 and above in Beijing, China. Gerontechnology 2014; 13(2):310; doi:10.4017/gt.2014.13.02.066.00 Purpose Osteoporosis is one of the major public health problems facing aging individuals of both sexes¹. OP would induce fracture², which do poses a negative effect on the elders' life quality and causes financial and care burden to the patients' families and to society³. It is important to track risk factors associated with osteoporosis so that interventions to prevent osteoporosis can be done in a timely manner. Most of the existing literatures about risk factors of osteoporosis focus on demographic variables, socioeconomic status, and lifestyle and environment variables. However, very few studies have looked at the association between housing type and osteoporosis. Method Data from tracking research about the urban and rural elders in Beijing, China in 2010, comprising 3,168 samples, is used to test the hypothesis whether housing conditions satisfaction is negatively associated with the occurrence of osteoporosis among elders by multivariable logistic regression. Results & Discussion After controlling for confounding variables, housing conditions satisfaction is found to be significantly associated with osteoporosis (OR=0.60, 95%CI 0.46-0.78). Efficient intervention of osteoporosis among elders should consider housing factors. In order to modify the house to meet the senior adults' need, further qualitative research is needed.

References

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Keywords: housing & daily activities, elderly people, osteoporosis, housing conditions Address: Institute of Population Research, Peking University, Beijing, China E: iamtina wij@126.com

Table1. Adjusted Odds Ratio (OR) and its 95% confidence interval (CI) for osteoporosis

Characteristic OR (95%CI) Housing satisfaction: satisfied 0.60 (0.46-0.78) < 0.001 Unsatisfied Referent Household financial status: Well off Referent Make ends meet 2.16) >0.05 Financial difficulty 3.56) < 0.01 Electric radiator: Have 0.66 (0.50-0.86) < 0.01 Not have Referent Gender: Male 0.48 (0.35-0.65) < 0.001 Female Referent Education: Illiterate Referent 1.55 (0.98-2.45) >0.05 Elementary school Middle school 1.96 (1.21-3.17) < 0.01 High school and above 2.37 (1.45-3.88) < 0.01 Location: Urban 2.18 (1.38-3.42) Rural Referent Diabetes: Yes 1.86) < 0.05 No Referent Hypertension: Yes 2.03) < 0.01 No Referent Heart disease: Yes 2.56) < 0.001 No Referent ADL: Independent Referent Dependent 2.98) < 0.001