AB0181 EPIDEMIOLOGY STUDY ABOUT OSTEOPOROSIS IN POSTMENOPAUSAL WOMEN ABOUT 1000 CASE

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Background Osteoporosis is a bone disease who concerns above all postmenopausal women. It's characterised by bone loss and associated fractures. In France, in 1995 it's 1% hospital cost. We realised a transversal study about osteoporosis and risk factors with 1000 women.

Objectives We excluded women with hormonal substitutive treatment and secondary osteoporosis. The study group was randomised. All patients were interviewed about risk factor and bone mineral density was measured by dual energy X ray. One woman was excluded for myeloma.

Methods We compared risk factor between osteoporosis group and non osteoporosis group determined by densitometry OMS criteria, with student t test or chi2. Finally a multivarious analysis includes all significative risk factor.(p < 0,05).

Results In our study, there was 25%osteoporotic patients. The univariuous analysis find a significant relation between osteoporosis and study level, the age at menopause, thyroid disease, body mass index, calcium intake, milk drink, fresh water consumption, white cheese. The multivarious analysis shows a significant relation between osteoporosis and age (odds ratio = 1,1 per year), the level study (odds ratio = 0,34 between; after first grade diploma and no education), Body Mass Index (odds ratio = 0,86 per unity), milk drinks (odds ratio = 0,7).

The discriminant analysis after further adjustment for confounding factors allows to diagnose 67% of osteoporotic women.

Conclusion In our population, we find some usual risk factor of literature.

The interview is not sufficient to diagnose osteoporosis certainly but allow to purpose bone density. The results of this bone density with clinical information is necessary to start the best treatment.

AB0182 HIP VS CALCANEUS BONE MINERAL DENSITY IN POSTMENOPAUSAL WOMEN

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Background Assessment of postmenopausal osteoporosis is usually delayed due to central densitometers' lack in some areas. Peripheral densitometers have been proposed for osteoporosis screening.

Objectives To assess the relationship between bone mineral density (BMD) measurements in post-menopausal women using central (DEXA) and peripheral (PIXI) densitometers.

Methods 81 women, included in a post-menopausal osteoporosis assessment schedule, were consecutively selected for this study. In all women, we collected: 1) an osteoporosis risk factors' questionnaire; 2) measurement of hip BMD, using a DEXA densitometer (NORLAND); and 3) measurement of calcaneus BMD, using the peripheral densitometer PIXI(LUNAR).

Results Osteoporosis risk factors collected: mean age (years) = 63(9.6 sd); mean time since menopause (years) = 15.6(9.2 sd);

mean body mass index = 28.9(4.5 sd); mother's hip fracture = 6.2%; previous Colles fracture = 8.6%; previous vertebral fracture = 6.2%; previous hip fracture = 1.2%; other non-traumatic fractures = 13.6%; calcium intake < 1 g/d = 88.9%; sedentarism = 45.7%. Statistical significance was found between absolute BMD values (Pearson's correlation coefficient: r = 0.501(p = 0.01)), and t-score values (Pearson's correlation coefficient: r = 0.575 (p = 0.01)) obtained with both densitometers.

Conclusion Peripheral densitometers can be a reliable and suitable choice for postmenopausal osteoporosis screening in primary health centres.

AB0183 CORRELATION BETWEEN THE BONE MINERAL DENSITY AND THE OBESITY IN HEALTHY WOMAN

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Background

Objectives

Methods In 425 randomly chosen women, bone mineral density (BMD) assessment of lumbar spine (region L2-L4) was done using LUNAR DPXL device. All the subjects included were healthy with negative significant risk factors for osteoporosis. The demographic data of included subjects are: Mean age of women was 47.1 (20-78) yrs; menarche mean age was 13.5 (10-19) yrs; average weight 68.8 (45-107) kg and average height 160 (147-183) cm; mean value of BMI was 25.6 (14.8-45.6) kg/m²; mean value of BMD was 1.16 (0.701-1.98) g/cm³.

According to BMI the subjects were divided in 4 groups (grade 0 = normal, grade 1 = mild obesity, grade 2 = moderate obesity and 3 = severe obesity) and the linear correlation test was done between BMD and BMI.

Results The results with correlation coefficient (R) and corresponding p values are shown in the Table 1.

Abstract AB0183 Table 1 Correlation between BMI and BMD

	BMI (kg/m ²)				
Group/N	0/234	I/104	II/69	III/18	Total/425
BMD (g/cm ³)	22.4 ± 1.9	27.0 ± 1.4	31.3 ± 1.6	37.3 ± 1.93	25.6 ± 4.6
R	0.078	0.233	0.27	- 0.497	0.134
p	0.906	0.16	0.021	0.036	0.006

Conclusion The significant positive correlation (p = 0,006) was observed between lumbar spine BMD and BMI in whole group. In subjects with normal BMI (group 0) and mild obesity such correlation was not present. In subjects with moderate obesity significant positive correlation was observed (p = 0,021), while in group representing severe obesity subjects highly significant negative correlation was calculated (p = 0,036).

AB0184 MISDIAGNOSIS OF INSUFFICIENCY FRACTURES IN PATIENTS WITH INFLAMMATORY JOINT DISEASE

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