CAROTID ATHEROSCLEROSIS IN BRAZILIAN WOMEN WITH LOW FRAMINGHAM RISK SCORE

ACC Moderated Poster Contributions
McCormick Place South, Hall A
Sunday, March 25, 2012, 11:00 a.m.-Noon

Session Title: Prevention: Clinical: Updates in Gender Related Research
Abstract Category: 9. Prevention: Clinical
Presentation Number: 1183-240

Authors: Isly Lucena de Barros, Laura Costa, Ana Paula Tavares Souza, Pedro Veras, Daniela Fantato, Bento Bezerra, Natanael Morais, Moacir Novaes, José Carlos Nicolau, Heart Institute - University of São Paulo Faculty of Medicine Clinics Hospital, São Paulo, Brazil, University of Pernambuco, Recife, Brazil

Background: Cardiovascular disease is the leading cause of death among Brazilian women, particularly those from north and northeast region. The Framingham risk score (FRS) is a currently tool to identify women at increased risk for cardiovascular disease and determine appropriate primary prevention therapy. However, there are several clinical limitations for its use. The main purpose of the present study was to evaluate the prevalence of carotid atherosclerosis by carotid ultrasound in a population of peri- and post-menopausal women with low and very low risk of events according to the FRS.

Methods: We studied 806 healthy peri- and post-menopausal women, 45 to 65 years-old (mean age 54.3±5.3 years), with absence of known cardiovascular disease, and without hormone therapy utilization. This sample was representative of poor class women from Recife, one of the Brazilian Northeastern state capitals. From the overall population we selected 765 women with completed data, classified at very low (10 years event rate ≤ 5%; n=683) or not very low risk (≥6%; n=82). B-mode ultrasound was utilized for carotid evaluations. Presence of carotid atherosclerosis was defined as either the presence of plaque and/or carotid intima-media thickness (CIMT) ≥ 75th percentile.

Results: The prevalence of carotid atherosclerosis in the overall population was 30% (230/765), being of 28,5% (195/683) in the very low FRS subset, and of 42,7% (35/82) in the population with higher FRS risk. Difference between groups was 14,2% (95%CI 2.77 to 26.1, P-value=0,0116).

Conclusions: In this sample of asymptomatic peri- and post-menopausal women the prevalence of carotid atherosclerosis was surprisingly high, and increased significantly between very low and higher FRS.