ROLE OF ANKLE BRACHIAL PRESSURE INDEX IN DIAGNOSIS OF PERIPHERAL VASCULAR DISEASE IN TYPE 2 DIABETES MELLITUS

Background: Peripheral arterial disease in patients with type 2 diabetes mellitus is an important risk factor for vascular events. Recommendations about whether ankle depending on the source brachial index should be performed; therefore, it is necessary to study the importance of risk factors associated with peripheral arterial disease. And also, it is useful to perform ankle brachial index in newly diagnosed and clinically treated patient with peripheral arterial disease symptoms.

Methods: In the present study the data was collected from 711 subjects and divided into three groups. In group 1, 600 type 2 diabetes mellitus patients, symptomatic or not for peripheral arterial disease; In group 2, 61 type 2 diabetes mellitus patients newly diagnosed and clinically treated patient and in group 3, 50 subjects without diabetes. Ankle brachial index, medical records and physical examination were performed in all patients, according to cardiovascular risk factors.

Results: The results of the present study indicates that the abnormal ankle-brachial index in 49% (77/156) $\geqslant$50 years and 42% (16/38) <50 years (p = not significant) was observed in group 1. Considering clinically treated patients, a peripheral arterial disease prevalence of 39% (24/61) was observed; among these, 48% (13/27) were <50 years and 32% (11/34) were $\geqslant$50 years (p = not significant). A forward stepwise regression model was developed, with type 2 diabetes mellitus duration (r^2 = 0.12) and sedentary lifestyle (r^2 = 0.14) found as independent variable predictors of severity of peripheral arterial disease, related to ankle brachial index.

Conclusion: Hence in the present study suggest that, in type 2 diabetes mellitus, ankle-brachial index should be measured by diagnosis. In addition, sedentary lifestyle was strongly associated with presence and severity of peripheral arterial disease.