

Evaluación ultrasonográfica de la función endotelial en niños y adultos chilenos

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Abstract

Background: Endothelial dysfunction is an important pathogenetic mechanism in the development of atherosclerosis. **Aim:** To evaluate endothelial function in Chilean children and adult subjects and to provide normal values of flow mediated dilatation (FMD) in the Chilean population. **Subjects and Methods:** Flow mediated dilation of the brachial artery was measured by high resolution ultrasonography in healthy children (n=32) and adults (n=69) of both gender, in a group of 8 healthy women during 4 periods of pregnancy and late postpartum, and in 22 men and women with a history of stroke or coronary heart disease. **Results:** FMD in boys and girls was 9.9 ± 3.6 and $10.0 \pm 4.2\%$ respectively (NS). The figures for young women and young men were 11.3 ± 3.8 and 8.6 ± 3.9 , respectively ($p=0.02$); for postmenopausal women and older men, 5.5 ± 6.6 and 7.6 ± 6.7 respectively (NS). During normal pregnancy and postpartum there were no significant changes in FMD. Patients with cardiovascular disease had a FMD of $0.3 \pm 5.2\%$, ($p < 0.001$, with other groups). **Conclusions:** The present study provides values of FMD in healthy Chilean subjects of different ages, and in patients with coronary heart disease.