



P50 The Administration of Losartan/Amlodipine in Fixed Combination Versus Losartan Improves the Hemodynamic and Arterial Stiffness Parameters in Patients with Systemic Hypertension Grade 1 and 2

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ABSTRACT

Purpose/Background/Objectives: Hypertension (HAS) represents 9.4 million deaths from all the cases of cardiovascular disease worldwide [1]. The pulse wave velocity (PWV) and some hemodynamic parameters have been associated with this outcome [2,3]. Losartan, as well as amlodipine, have shown benefits on hemodynamic parameters [4,5] however, it is unknown if losartan/amlodipine combination is better than losartan as a monotherapy. We evaluated losartan/amlodipine effect in a fixed combination versus losartan on hemodynamic and arterial stiffness parameters in patients with systemic arterial hypertension.

Design and Methods: We conducted a randomized, double-blind study in 28 hypertensive patients according to AHA criteria 2017 [6]. 14 patients received losartan 100 mg per day and 14 losartan/amlodipine 100/5 mg per day, for 8 weeks. Hemodynamic parameters and arterial stiffness measurement were performed with a Mobil-O-Graph[®] [7].

Results: The combination of losartan/amlodipine improved hemodynamic and arterial stiffness parameters compared with losartan, reducing peripheral vascular resistance (RVP) (0.10 ± 0.08 vs 0.05 ± 0.08), PWV (0.52 ± 0.45 vs 0.33 ± 0.359), daytime PWV (7.24 ± 0.90 vs 7.61 ± 1.03), nocturnal PWV (6.86 ± 0.96 vs 7.27 ± 1.17) and diastolic blood pressure (DBP) (11.21 ± 6.15 vs 5.92 ± 7.65).d

Conclusion: We did not find differences between single or combined medication in terms of BP reduction. However, arterial stiffness parameters were better in the combined therapy.

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