Title: Histamine skin sensitivity in patient with drug hypersensitivity

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Body: One of less studied is the test of histamine serial dilutions sensitivity and exactly this test may be very important for antihistamine preparations effectiveness study. Materials and methods: We studied 96 patients; from them 48 were patients of ENT department, who suffered from drug hypersensitivity reactions of various severity, from mild urticaria to anaphylaxis (study group). The control group consisted of 48 ENT patients with same diseases, but without drug hypersensitivity. Patients were determined into “study” and “control” group according to “case-control” principle. Seven day before histamine sensitivity tests cell antihistamine preparation were stopped. Histamine serial dilutions test was performed with standardized prick-needle. We used ten 0,1% histamine preparation. The end point was histamine dilution that caused papule ≥2mm in diameter. Results and discussion: In the control group in 54,2% the end point was 10-2 histamine dilution, in 29,2% - 10-3, in 7,3% - 10-4, in 5,1% - 10-5. There were few cases, when our patients debit react by papule formation to 0,01% histamine dilution and reacted only to 0,1% of histamine. In patients with drug allergy we found an elevated skin sensitivity. Thus, the end-point 10-2 was found in 39,5% of patients, 10-3 – in 21,6%, 10-4 – in 9,9%. The difference in 10-2 dilutions and 10-3 dilutions between the control and studied group was statistically significant. We concluded that in patients with drug allergy the increased skin sensitivity to histamine was found, and the level of this hypersensitivity should be considered in individual antihistamine preparations prescription.