

years it increased up to 86% children. Specific immunotherapy resulted in normalization of T-lymphocyte functional activity, IgA, IgG and sIgA serum levels in nasal secret. Prolonged therapeutic effect was registered in all clinical immunological data after the specific immunotherapy course.

We studied the functional state of central nervous and immune systems in patients with BA and effect of acupuncture on it. Positive result of acupuncture was obtained in 88.6% patients.

Along with objective clinical effect, i. e. ceasing of asphyxia attacks, patients' quality of life became much better: they gained optimism, eagerness to work, decrease of irritation and tearfulness, improvement of appetite and sleep. Immunological parameters also improved. Our results demonstrate high clinical and immunologic effect of acupuncture in BA patients with initial changes in central nervous system.

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IMMUNOTHERAPY AND MAST CELL ACTIVATION

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In the early phase of allergic reaction mast cells are the main cellular effectors of acute inflammation releasing preformed and newformed mediators. The release of mediators is therefore a marker of mast cell activation and could be used to evaluate early allergic reaction. From the preformed mediators histamine and tryptase can be currently assayed in biological fluids. Histamine can be originated in mast cells, basophils and probably from a pool of other cells or extra cellular spaces in respiratory mucosa. Tryptase is only released by mast cells, has a good stability in fluids and reliable assays are nowadays available. Tryptase is spontaneously released from mast cells in respiratory mucosal after allergen inhalation and its concentration in fluids for instance during pollen season corresponds to the intensity of allergic disease. Nasal challenge with allergen tries to reproduce natural exposure conditions and allows to evaluate on controlled conditions the kinetics and evolution of nasal allergy.

The study of tryptase release after nasal challenge with allergens is therefore a good and reliable method to evaluate mast cell response to allergens. In the last few years we have first tried to standardize the method for tryptase assay in nasal lavage fluid after nasal challenge and in a second phase applied this method to the evaluation of mast cells reactivity to allergen before and after specific immunotherapy in polinosis.

Nasal provocation tests have been done before pollen season with increasing dosages of 10, 100, 1000 PNU. Tryptase assays in nasal washing have been done at 10, 20 and 30 min after provocation by CAP or RIA methods. Tryptases assays have been done before starting immunotherapy and after 2 years of immunotherapy. Nasal fluid has been always collected in absence of therapy with anti-histamine drugs in the last week, inhaled or systemic steroids DGCS or topical anti-histamines in the last 3 days.

The data obtained suggest that tryptase assays in nasal washing could be a useful addition in diagnostics of pollen allergy. A clear cut increase on tryptase concentration in nasal lavage fluid has been observed after nasal provocation. The results obtained suggest that a higher concentration of pollen extract (1000 PNU) is more reliable for the evaluation and that the more significant results are observed 10 and min after nasal challenge specific immunotherapy clear cut blocks the tryptase release provoked by nasal challenge decreasing the amount of tryptase released by mast cell after each one of the different concentrations employed but also slowing the release process as shown by the latter peak (20 min) observed after immunotherapy. These data point to an effect of systemic specific immunotherapy on nasal mast cell reactivity probably due either to a decrease of fixed IgE through high affinity receptors or to a blockade on mast cell releasability as suggested by the late peak (20 min.) of tryptase release.

Tryptase assays in nasal washing after provocation tests are a reliable, safe and useful additional method in diagnostics of pollen allergy and furthermore in the control of efficacy of specific immunotherapy. Mast cell reactivity in rhinitis can be studied by the assay of tryptase in nasal fluid after nasal challenge. An increase in tryptase in nasal washing is a marker of allergy to the extract employed. Specific systemic immunotherapy significantly decreases mast cell reactivity after nasal challenge with the same allergen as show by the decrease in tryptase release.

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IMMUNOLOGICAL MONITORING OF PATIENTS WITH CHRONIC DISEASES IN THE COURSE OF IMMUNOREHABILITATION

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Comprehensive phenotypical characteristics of immunocompetent peripheral blood cells (CD3, CD4, CD8, CD19, CD25, CD45RO, CD95 and HLA-DR) is presented. Proinflammatory cytokines (IL-1 β , IL-6 and