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Abstracts were published in the alphabetical order of authors' last names.

INCREASE IN INTERLEUKIN-6 RESPONSE IN INFANTS WITH ACUTE OBSTRUCTIVE BRONCHITIS AGAINST THYMOMEGALY

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Introduction: The problem of acute obstructive bronchitis (AOB) in infants remains relevant in pediatric practice. The thymus, as one of the central organs of the immune system, is involved in the pathogenesis of bronchopulmonary disease by secreting proinflammatory interleukin-6 (IL-6). However, the role of this cytokine has not been well understood in the regulation of inflammatory process in infants with AOB against thymomegaly (TM).

The aim: To study the level of IL-6 in the serum of infants with AOB against TM.

Materials and methods: The research was conducted based on the Municipal Non-Profit Enterprise "Children's Clinical Hospital of Saint Zinaida" Sumy City Council in 2019. 24 infants with AOB were examined. The infants were divided into two groups: Group I - AOB patients without TM (14 children); Group II - patients with AOB with TM (10 children). The control group consisted of 12 healthy infants, representative of age and gender.

The concentration of IL-6 in the serum was determined by solid-phase enzyme-linked immunosorbent assay using test systems. Statistical processing of the obtained results was performed using the software package "Statistics 6.0".

Results: It was found that in patients of group I in the acute period of the disease the content of IL-6 in the serum increased 3 times compared to the control group - $(17,62 \pm 0,39)$ pg/ml ($P < 0,001$). After treatment, AOB secretion of IL-6 in patients of group I was significantly reduced to $(7,13 \pm 0,23)$ pg/ml ($P < 0,001$).

When assessing the concentration of IL-6 in the serum of children of group II, a more pronounced increase (7 times - $(28,39 \pm 0,76)$ pg/ml ($P < 0,001$) compared with the indicators of healthy infants) was revealed. In the period of convalescence in infants with AOB, the level of IL-6 significantly decreased to $(12,48 \pm 0,47)$ pg/ml ($P < 0,001$) on the background of TM.

Conclusions: In the acute period of the disease in infants with AOB without concomitant TM, a significant increase in the content of the proinflammatory cytokine IL-6 is determined. This reflects an adequate response from the immune defense to the action of the infectious agent in the nonspecific resistance phase.

The revealed dynamic changes of cytokine status of infants with AOB on the background of TM indicate the changes in the criteria of thymus-dependent immunological insufficiency, in which indicators of the T-cell level of immunity are violated and as a consequence, there is a dysfunction of humoral immunity factors.

KEY WORDS: interleukin-6, acute obstructive bronchitis, thymomegaly

DYNAMICS OF THE QUALITY OF LIFE OF PATIENTS WITH NEUROPATHIC DIABETIC FOOT SYNDROME AFTER PLASMATHERAPY

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Introduction: Long-standing diabetic foot ulcers lead to reduced quality of life and poor psychosocial adaptation. Treatment of foot ulcers is aimed at acceleration of wounds healing, but insufficient blood circulation, lack of oxygen and the presence of neuropathy often interfere with wound healing. This can be overcome by introducing new alternative treatments, such as autologous plasmatherapy, rich in growth factors.

The aim is to evaluate quality of life dynamics in patients with neuropathic diabetic foot ulcers after plasmatherapy.

Materials and methods: The study included 26 patients with diabetes mellitus type 2. Including criteria: the sensory-motor neuropathic diabetic foot syndrome of 2 stage by Wagner after complete cleansing of the wound surface to stimulate the proliferative phase. Patients were divided into two groups: in the 1st (13 patients) patients received standard treatment (hypoglycemic therapy, vasoactive drugs, debridement of the wound surface), in the 2nd group (13 persons) standard treatment was supplemented with autologous plasmatherapy, rich in growth factors. The regime intradermal injections: ones per week total of 3 times, injections were carried out on the periphery of the wound defect, with wound bottom infiltration.

Assessment of the neuropathy was performed using the Neurological Deficit Scale - NDS, where a score of 0 indicated no neuropathy, a score of 1 moderate neuropathy, and a score of 2 severe neuropathies.

EuroQoL-5D-5L questioner was used system to evaluate the dynamics of life quality. It consisted of the description part of five dimensions: mobility, self-care, usual activities, pain/discomfort, and anxiety/depression. For a quantitative assessment of the dynamics, each answer matched 1 point. Points from 1 to 5 were divided into two categories, where 1, 2, and 3 score where corresponded to points above the average level quality of life; and 4 and 5 were below average. Evaluation of the results was carried out after 3 procedures of plasmatherapy (3 weeks).

Results: At baseline the neurological status was similar in both groups; the average score on the NDS in the 1st group was 13.84, in the 2nd group - 13.92. In 3 weeks' evaluation showed a significant improvement in status in patients of the 2nd group due to the recovery of pain, tactile and temperature sensitivity, the average score was 7.54 vs 10.31 in the 1st group.