Results and discussion: The age median of patients at the enrollment was 66 (range 42-83) years. 3 (7 %) pts had IIA stage on Salmon-Durie, 22 (49 %) – IIIA and 20 (44 %) – IIIB. 33 (73 %) pts had evidence of CFH grade I, 9 (20 %) – II and 3 (7 %) – III. An objective response on MM treatment was reached 26 (58 %) pts, including complete response (CR) and very good partial response (VGPR) - 7 (16 %) pts. 33 (73 %) pts were alive with a median follow 11 months. The predictive values of BNP-fragment levels on OS were not detected. Analysis of the activity of NT-proBNP allows detecting of a significant correlation with grades of CFH and OS (p < 0.05). The levels of NT-proBNP more than 0.93 ng/ml (sensitivity 82%, specificity 62%) was identified as a predictor of the likely risk of mortality. 1-year OS of pts with proBNP levels in the blood above 0.93 was 53% versus 78% (p < 0.05) for subjects with a lower level of this peptide.

**Conclusion**: NT-proBNP levels in blood serum  $\geq 0.93$  ng/ml were identified as the adverse factor for patients with MM and concomitant CHF. BNP-fragment levels in this clinical situation have not predictive value.

## VIRAL HEPATITIS B, C, AND D IN CHILDREN - CLINICAL, EPIDEMIOLOGICAL AND EVOLUTION ASPECTS

## Foca Eugenia, Poiana Ina

Academic adviser: Serbenco Ludmila, M.D., Ph.D., Associate Professor, State Medical and Pharmaceutical University "Nicolae Testemițanu", Chisinau, Republic of Moldova

**Introduction:** B, C and D viral hepatitis infection remain to be a serious global problem of Public Health and a major cause of chronic hepatitis, cirrhosis and hepatocellular carcinoma. Despite the implementation of an effective vaccine, HBV infection still remains an important, worldwide cause of chronic viral hepatitis.

Aim: to determine the epidemiological, diagnostic, clinical, developmental aspects and treatment of viral hepatitis B, C and D in children.

## Objectives:

- to assess the role of the source in the transmission of infection with hepatitis B, C and D viruses in children.
- to estimate evaluating the clinical and diagnostical particularities in patients with viral hepatitis B, C, D.

Materials and methods: the study included 40 pacients diagnosed with acute/chronic HBV, HCV and HDV infection during the years 2001-2011, treated in IMSP Municipal Hospital of Contagious Diseases in Children, Chişinău. Patients were subjected to clinical examination, biochemical and serological analysis and to ultrasonography of the abdominal cavity organs, to esthablish clinical diagnosis.

**Results:** the study included 22 girls and 18 boys, average age  $10.4 \pm 5.1$  years. Acording to the etiology, the clinical diagnosis of HVB was established in 28 (70%) cases, HVC in 8 (20%) cases and HVD in 4 (10%) cases. Typical type (icteric) was determined in 22 children, and the atypical type in 18. Acording to the evolution, there were determined the following types: acute in 24 (60%) cases, subacute in 4 (10%) cases and chronic in 12 (30%). Out of 37 children aged over 6 months, 8 (21,6%) children presented an anamnesis of surgical procedures, dental consultations and blood transfusions during the last 6 months and 2 teenagers had unprotected sexual relations with more than one partner. Epidemiological investigation in the context of maternal-fetal and habitual routes of transmission was relevant in 12 (30%) children.

Conclusion: Epidemiological investigations established that the most frequent routes of transmission of viral hepatitis in children included in our study were the parenteral, perinatal and habitual ones. Polymorphic symptoms present in 45% of patients showed difficulties in establishing the clinical diagnosis of viral hepatitis. Both pregnant women and family members of the outbreak had to be investigated not only for HBsAg, but also for the presence of serological markers of hepatitis: anti-HB cor (IgM+ IgG), anti-HCV (IgM+IgG) and anti-HVD (IgM+IgG).

Key words: viral hepatitis B, C, D; clinical management; epidemiology; follow-up; diagnosis.

CORRELATION BETWEEN SERUM IGE AND SEROCONVERSION OF SPECIFIC ANTI-BODIES AGAINST ATYPICAL PATHOGENS (Mycoplasma pneumoniae, Chlamydia pneumoniae) AND RESPIRATORY SYNCYTIAL VIRUS IN PATIENTS WITH BRONCHIAL OBSTRUCTION OF ATOPIC OR INFECTIOUS ETIOLOGY

Savoschin Dorina, Vasilos Liubov, Cojocaru Ala, Horodisteanu-Banuh Adela, Aramă Marina, Cirstea Olga

State Medical and Pharmaceutical University "Nicolae Testemițanu", Chisinau, Republic of Moldova

**Introduction:** Asthma onset in children is frequently associated with respiratory infections of different etiology: atypical bacteria such as *Chlamydia pneumoniae* (CPN) or *Mycoplasma pneumoniae* (MPN), and/or viruses (Respiratory syncytial virus (*RSV*), *Rhinovirus*). Recent researches showed that acute viral infection determines a structural susceptibility through inflammatory changes, and may facilitate asthma development in atopic children. However the contribution of each factor to asthma pathogenesis is still controversial.

Materials and methods: A case-control study included 129 children hospitalized in the Allergy and Pulmonology wards of the Research Institute for Maternal and Child Healthcare: the first group included 84 children with persistent asthma; the second group included 45 children with bronchial obstruction of infectious etiology. Specific antibodies were assessed using *immunoenzymatic assay* ELISA. Specific immunoglobulin classes A and G against CPN and MPN and immunoglobulin classes M and G against RSV were evaluated. The total serum immunoglobulin-E (IgE) titres were assessed. Statistical processing of the data was performed using the software Microsoft Excel and STATISTICA 6.0.

Results: The specific antibody seroconversion for the examined infections have been found in both study groups. In the first group of patients hospitalized with asthma exacerbation diagnostic titers of antibodies were detected as follows: against MPN in 8,8% of asthma cases, against CPN in 2,9% and RSV in 11,8% of cases. Antibody response to associated infections was detected for MPN+CPN in 5,9% of children; MPN+VRS in 11,8% of children; CPN+VRS in 2,9%. Estimation of these antibodies presence in the group of children with bronchial obstruction showed the presence of anti-MPN immunoglobulins in 6,6% of cases, anti-CPN immunoglobulins in 4,4% of cases and anti-VRS immunoglobulins in 8,8% of patients. No associated infections were found in this study group. Serum IgE levels were raised from the cut off value in 91,2% of the subjects from the asthma group and in 28,9% from the second group. In addition to that, the serum IgE levels in children with asthma exacerbation was 1,5 folds higher comparing with those serologically negative (916,0 $\pm$ 236,0 IU/ml and 647,9 $\pm$ 104,6 IU/ml respectively, p>0,05) and correlated significantly with anti- MPN immunoglobulin G (r = 0,58). Also an inverse correlation was found between the serum IgE levels and anti-RSV immunoglobulin M (r = -0,53, p<0,01).

**Conclusions:** Infectious factors especially *Mycoplasma pneumoniae* have a direct impact on asthma pathogenesis, allergic sensitization and serum IgE synthesis. *Respiratory syncytial virus* seems to have a