## CELLULAR IMMUNITY AND CHRONIC LUNG DISEASES IN CHILDREN

M. Maneva, G. Micevska, Z. Sarevska

Institute for Respiratory Diseases in Children, Skopje, Macedonia

Aim: Is there any changes in cellular immunity status as a reason for chronic lung diseases in children? Material: 161 children with overcome pneumonia (after at least 5 yr. period) pneumonia, occurring in early period of their life (from 0 to 3 years). Late sequels had 62(38.5%) of them: bronchial asthma (BA) -27(16.8%), bronchiectasis (BE)-18(11.2%), recurrent obstructive bronchitis and after radiological changes (adhesions in lung and diaphragmatic pleura)-5(3.1%), bronchitis deformans (BD)-4(2.5%), BE+BA-2 (1.2%) and BD+BA-1 (0.6%). **Methods:** Two tests were used: 1. Test of inhibition of leukocyte migration from peripheral blood (LIF) and their response to mitogenic: purified protein derivate (PPD), monilia and phytohaemagglutinin (PHA); 2. T and B cells quantitation with rosettes (sheep RBC). Results: LIF or non-specific cellular immunity was good (the function of T-cells is not primary damage). Normal count of T-lymphocytes was found in 39 children (62.9%), decreased in 19(30.6%) in patients with BA, increased in 4(6.5%) in BE. Blymphocytes were normal in 41 (66.1%), increased in 21(33.9%) in BE, while no one had decreased number. **Conclusion:** These results excepted the possibility of eventual primary immunodeficiency as a cause for development of chronic lung processes in children with proved late sequels after overcome pneumonia.