

PW16BS04: ULTRASTRUCTURE OF MESENTERIAL LYMPHATIC NODES AND SPLEEN IN RATS WITH EXTRAHEPATIC PORTAL HYPERTENSION AFTER TREATMENT WITH VOBENZYM AND POLYOXYDONIUM

Kristina Dzhuma¹, Vasyl Prytula¹, Oleg Godik¹, Eugene Rudenko¹, Roman Zhezhera²

¹Bogomolets National Medical University, Kiev, Ukraine. ²National Children's Specialized Hospital "Okhmatdyt", Kiev, Ukraine

AIM OF THE STUDY

The lack of the data on morphological and functional changes in the organs of immune system such as mesenteric lymphatic nodes and spleen involved in the pathological process under extrahepatic portal hypertension (EPH) as well as absence of the theoretical base on preventing immunological complications has pushed us to perform an experimental model on laboratory animals. The aim of the study was to investigate the ultrastructural changes in the mesenteric lymphatic nodes and spleen in rats with EPH and after treatment with vobenzym and polyoxidonium.

METHODS

The object of electron microscopic investigation and gas chromatography was tissue of the spleen and mesenteric lymphatic nodes of 20 juvenile rats which were divided into two groups: first group (10 rats) to whom in the age of two months EPH was modeled surgically, second group (10 rats) with EPH who for one month was treated with vobenzym and polyoxidonium.

MAIN RESULTS

It was determined that proposed schema of the treatment helps to achieve better preservation of ultrastructure of mesenteric lymphatic nodes and spleen in 90% of laboratory animals. It have permitted to stop degenerative processes caused by the invasion of intestinal bacteria, by activating the process of phagocytosis, antibody stimulation, increasing resistance of membranes to cytotoxic agents, inhibition of lipid oxidation. Furthermore processes of circulating immune complexes and proliferation of immune cells were normalized if compared to untreated animals.

CONCLUSIONS

Positive changes give reason to believe that such combined scheme is an appropriate immune therapy under extrahepatic portal hypertension.