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DISTRIBUTION OF SOME FUNCTIONAL MOLECULES ON T-LYMPHOCYTES AND NK-CELLS IN CHRONIC LYMPHOCYTIC LEUKEMIA

N. V. Isaeva^{a,*}, E. N. Zotina^a

^aKirov Research Institute of Hematology and Blood Transfusion of Federal Medical-Biological Agency, Kirov, 610027, Russia
*e-mail: isaevanatalia@yandex.ru

In patients with chronic lymphocytic leukemia who are at the stage of diagnosing the disease, T-lymphocytes, their subpopulations, and natural killer (NK) cells were characterized according to the distribution of some membrane molecules of intercellular interaction and signaling on them: CD45, CD3, CD4, CD8, CD16 and CD56. Modern methodological approaches to determine the studied parameters were used, taking into account the characteristics of the lymphoid pool of blood of patients with chronic lymphocytic leukemia. It has been established that the population of T-lymphocytes of peripheral blood of patients is characterized by a decrease in the content of CD45 and

CD3 receptors on the surface. On the membrane of lymphocytes belonging to the T-helper subpopulation, the average level of the CD4 receptor is reduced; a subpopulation of cytotoxic T-lymphocytes remains unchanged in the presence of the CD8 receptor. The CD8 and CD16 molecules are distributed on the surface of the EK-cells of patients with chronic lymphocytic leukemia at a normal level, while the CD56 molecule is in a significantly lower quantity. The data obtained expand the understanding of the energy of cells of the immune system and can be used in predicting the course of chronic lymphocytic leukemia.

Keywords: chronic lymphocytic leukemia, T-lymphocytes, NK-cells, average fluorescence intensity, flow cytometry