

P4. THE IMPORTANCE OF MORPHOLOGICAL EXAM OF PERIPHERAL BLOOD IN PATIENTS WITH ESSENTIAL THROMBOCYTEMIA.

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Introduction: In patients with Essential Thrombocytosis/Primary Thrombocythemia/ET, associated with sustained megakaryocyte proliferation and increased number of circulating platelets with various morphological, biochemical, and metabolic platelet defects- a blood smear is essential to validate the automated cell counts (CBC).

Methods: We present a patient: female, age 62, with ET for 20 years, with several thrombotic episodes and splenectomy in antecedents, treated mainly with hydroxyurea and aspirin. We performed automated CBC for the platelets number (PLT) and cytologic exams of blood smears. CBC were performed on a Coulter AC.T Diff analyser; we examined the blood films MGG stained on Nikon Eclipse E 200 microscope.

Blood smears were obtained both from peripheral and capillary blood. We evaluated results over ten weeks period, once a week, after a reversible thrombotic episode.

Results: PLT, on automated CBC: $281.9 \pm 33.25 \times 10^9/L$; estimated on blood films: $559.5 \pm 66.02 \times 10^9/L$.

The peripheral films show large platelet aggregates, varying degrees of platelet anisocytosis with larger atypical forms and frequent megakaryocyte fragments. These facts generated significant differences between counts.

Discussion / Conclusion: In ET, morphological and functional defects of platelets interfere with automated counts. Microscopic exam of blood smear is mandatory in order to ensure the optimal management of these patients.