There is only one case on record for which the claim is made that a preceding trauma was the cause of a polycythemia which appeared afterwards (Zadek). During the war in 1917 the patient received a gunshot wound which caused a distortion of the spine. Approximately six years later he was treated in the hospital for an abscess of the neck, and apparently at that time no symptoms of any kind suggested the presence of polycythemia. One year later he suddenly became ill with colicky pains in the gastric region. The blood examination showed the existence of a dyscrasia diagnosed as polycythemia vera (8.58 million erythrocytes, 141 per cent hemoglobin, color index 0.89, 0.5 reticulocytes per 1000 red cells, an absence of megaloblasts, normoblasts and polychromasia, 77,400 platelets, 5,000 leucocytes, 8.4 per cent polymorphonuclear neutrophiles, 11.2 per cent lymphocytes, and 4.8 per cent mononuclears). A smear made from the marrow of the sternum revealed the presence of numerous megakaryocytes and mainly orthochromatic erythrocytes. The abdominal symptoms subsided slowly and the leucocytic shift to the left decreased at the same time. There was a reduction in size of the previously enlarged spleen and liver, but the number of erythrocytes was still increased markedly. At this time it was assumed that the entire process was probably not older than nine months. Upon reexamination three years later the erythrocyte count was normal (5.10 million), the hemoglobin concentration was 104 per cent, the leucocyte count was 3,800, the spleen was small, and the liver was still somewhat enlarged. A roentgen-ray picture taken of the chest at that occasion showed an old fracture of the tenth and eleventh rib and a scoliosis of the spine. Six years after the polycythemic episode his condition was essentially normal with the exception of a moderate leukopenia (4000 to 5000 leucocytes). The hyperbilirubinemia which had been present during and for some time after the polycythemic attack had disappeared.

In commenting upon these observations Zadek conceded that the remissions occurring in the Vaquez disease are not as prolonged as that seen in his case. He is convinced that a causative relationship exists between the war trauma, the thrombosis of the splenic vein, which apparently existed during the acute abdominal attack, and the polycythemia vera. He referred, in support of his contention, to a case of traumatic thrombosis of the splenic vein recorded by Severin.

In a critical analysis of this case it becomes apparent that there are several points in the observations which cast serious doubt upon the correctness of the clinical diagnosis upon which the argument is based. The absence of immature and nucleated erythrocytes, the low number of thrombocytes, and the presence of a leukopenia do not favor the diagnosis made. The blood picture resembles closely that observed by Kretz after splenectomy (polycythemia coupled with leukopenia and thrombopenia). It was pointed out, also, in the preceding discussion of traumatic erythrocytosis, that thrombosis of the