

INTERFERON IN THE TREATMENT OF POLYCYTHEMIA VERA

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Polycythemia vera(PV) is a hematopoietic stem cell disorder characterized by a sustained proliferation of erythroid, granulocytic and megakaryocytic cells in the marrow. There is not a standard therapy for PV. Phlebotomy can only relieve the elevated HCT. Radioactive phosphorus may be leukemogenic. Alkylating agents increase the risk of leukemia. Hydroxyurea has been found to control the hematologic manifestation of PV but the unmaintained remissions are short. We used IFN- α to treat patients with PV and found this is a good choice for controlling the disease. Fourteen patients with hematologically proven PV entered the study. IFN- α were given subcutaneously for six months at a dosage of 3 mIU 3x weekly. This was considered as one course. Depending on the hematological improvement therapy may be repeated as needed. Dipyridamole were administered for prevention of patients (13/14). HCT declined from 54.6(49.2-62.5)% to 42.2(38-47.3), hemoglobin from 16.4(15.2-18.8) to 13.1(11.6-14.7)g/dl. One patient did not respond and HU was given then. One thrombotic complication was seen in patients with IFN- α (myocardial ischemia due to high HCT), which was brought under control with phlebotomy with plasma infusion. With a median duration of 11 months (5-21) of IFN- α treatment WBC, PLT and LDH were within the normal range. The commonest side-effects were flu-like symptoms and loss of appetite. None of the patients withdrew from the study due to side-effects. These results suggested that interferon may be an active regimen in PV.