Recommendations for management of 6-thioguanine related persistent splenomegaly/portal hypertension

Around 5% of the 748 patients exposed to thioguanine in ALL 97 have developed persistent splenomegaly which appears to be due to nodular regenerative hyperplasia or portal fibrosis resulting in portal hypertension. Some have had an antecedent VOD like acute hepatitis whilst others had thrombocytopenia out of proportion to neutropenia during maintenance therapy. Some of those with splenomegaly have oesophageal varices, some of whom have bled and required banding. However not all children have been examined endoscopically. One patient has progressed to hepatopulmonary syndrome and has had a liver transplant. The long term outcome of these patients is still unknown. The recommendations for management of such patients outlined below are based on the national experience:

- It is important that all children who have received 6 TG are monitored long term and that outcome data are regularly shared with the paediatric haematology and hepatology/gastroenterology communities. Monitoring in the oncology clinic, should include abdominal examination, platelet count, liver function tests and abdominal ultrasound with Doppler studies if any of the former are abnormal.

- All patients with persisting splenomegaly should be referred to a paediatric liver/gastroenterology specialist to exclude other causes of liver disease and portal hypertension and to discuss and monitor the complications of portal hypertension. These children should be discussed with the supraregional liver centres and hospital letters shared with the local liver centre.

- Patients will be advised to avoid non steroidal anti-inflammatory agents, but the use of normal pharmacological doses of paracetamol is not contra-indicated.

- Any child with gastrointestinal bleeding should be referred urgently to a gastroenterologist/hepatologist for upper G.I. endoscopy and banding/sclerotherapy by an experienced endoscopist if oesophageal varices are confirmed. The local supraregional liver centre should be made aware of this development.

- Upper GI endoscopy and prophylactic treatment of oesophageal varices that have not bled (either with propranolol or banding) should be at the discretion of the supraregional hepatologist, preferably within a multicentre controlled trial, as evidence for primary prophylaxis of oesophageal varices in children is lacking. This study is starting in August 2007.

- Any child developing hepatopulmonary syndrome (breathlessness, hypoxia due to intrapulmonary shunting), refractory GI bleeding or evidence of decompensated liver disease (low albumin, coagulopathy, encephalopathy) should be referred immediately to a supraregional paediatric liver unit.

ALL 97 co-ordinators/Paediatric Liver Steering Group, Feb 2007
References


