A Case of Alpha-Fetoprotein-Producing Gastric Cancer

K F Foo,**M Med (Int Med), MRCP*, C K Tan,***FAMS, FRCP (Edin)*, K K Y Wong,****FAMS ,M Med (Int Med) MRCP*, G S Hong, *FAMS, FRCS*, B Y Ngan, *++MRCPath*

Abstract

Introduction: A case of alpha-fetoprotein (AFP)-producing gastric cancer is described in a 57-year-old Chinese woman. <u>Clinical Picture</u>: She presented with bleeding tendency and bone pain, and was found to have haematological evidence of disseminated intravascular coagulation and spinal metastasis. Her tumour markers, including AFP, Ca 19-9 and carcinoembryonic antigen (CEA) were elevated. In view of the elevated tumour markers, there was an exhaustive search for a primary lesion in the gastrointestinal tract, liver and ovaries. There was no radiological evidence to suggest any lesion in the chest, liver or pelvis. Lectin affinity electrophoresis of the AFP showed AFP-L2 and AFP-L3 bands, which are suggestive of a non-hepatoma malignancy. <u>Management</u>: Gastroscopy showed a gastric ulcer and she developed bleeding after the gastric biopsy which required urgent surgery. Intraoperatively she was found to have carcinomatous peritonei and a malignant ulcer in the greater curve of the stomach. Histology confirmed a linitis plastica like adenocarcinoma which stains for AFP. <u>Outcome</u>: She died from multi-organ failure 3 days after surgery. <u>Conclusion</u>: AFP-producing adenocarcinoma of the stomach is not uncommon. Lectin affinity electrophoresis of AFP is helpful in the differentiation between hepatoma and non-hepatoma malignancies.

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* Registrar

*** Consultant

- Department of Medical Oncology, National Cancer Centre + Consultant
- Department of Surgical Oncology, National Cancer Centre ** Consultant
- Department of Gastroenterology, Singapore General Hospital ++ Consultant
 - Department of Pathology, Singapore General Hospital

Address for Reprints: Dr Kian-Fong Foo, Department of Medical Oncology, National Cancer Centre, 11 Hospital Drive, Singapore 169610. E-mail: dmofkf@nccs.com.sg