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Letters to the editor

Exophytic primary squamous cell carcinoma of the stomach

To the Editor: Generally, primary gastric cancer is said to reveal adenocarcinoma. However, there are a few cases of primary gastric cancer that have squamous cell carcinoma (SCC). Among primary gastric cancer cases, the incidence of SCC ranges from 0.04% to 0.4%.[1,2] In addition, gastric cancer seldom grows exophytically and the proportion of exogastric tumors among all gastric neoplasms has been reported to be approximately 0.5%.[3] We report the case of a 78-year-old man who had primary gastric cancer with SCC after abdominoperineal resection (APR) due to rectal cancer. Also, the patient had exophytic growth of the gastric cancer.

In 1995, a 78-year-old man underwent APR due to rectal cancer. The histopathological findings of the rectal cancer revealed adenocarcinoma with lymph-node metastasis. After the operation, he received follow-up examinations regularly at our hospital. In December 2001, he detected an abdominal mass. Abdominal computed tomography (CT) demonstrated an 8-cm mass that was located in the dorsal side of the stomach and that compressed the transverse colon (Fig. 1). However, there had been no remarkable findings on abdominal CT that had been performed 6 months earlier. Laboratory data on admission, excluding a slightly elevated SCC antigen level (2.3 ng/ml) was normal. An upper gastrointestinal series revealed a large exophytic mass in the greater curvature of the stomach. Gastrointestinal fiberscope examination demonstrated a large ulcerated lesion (Borrmann 2) in the greater curvature. The diameter of the tumor inside this lesion was approximately 2 cm. Histological examination of a biopsy specimen indicated SCC. Neither distant metastasis nor other primary cancer lesions, excluding that in the stomach, were observed. On February 26, 2002, a laparotomy was performed. The operative findings included an exophytic mass arising from the posterior gastric wall of the greater curvature; the mass was adherent to the transverse colon, and there was no lymph node swelling. A subtotal gastrectomy with partial resection of the transverse colon was performed. The surgical specimen included an ulcerated tumor, which showed exophytic growth from the gastric wall. The tumor size was 8.5 × 6 cm. Microscopic histopathological findings revealed well-differentiated SCC (Fig. 2). The tumor had invaded to the muscularis propria of the transverse colon. There were no adenocarcinoma components even when all the sections in the specimen were examined microscopically. In addition, no squamous cells were found in the normal area of the stomach.

His postoperative course was uneventful and he left the hospital on the eighteenth day after the operation. So far, no signs of recurrence have been found, 17 months after the operation.

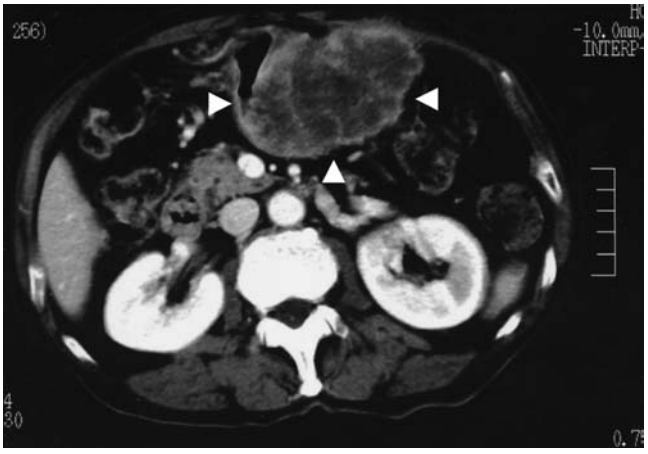

Fig. 1. Abdominal computed tomography demonstrated an 8.5-cm mass (*arrowheads*) that was located in the dorsal side of the stomach and pressed the transverse colon

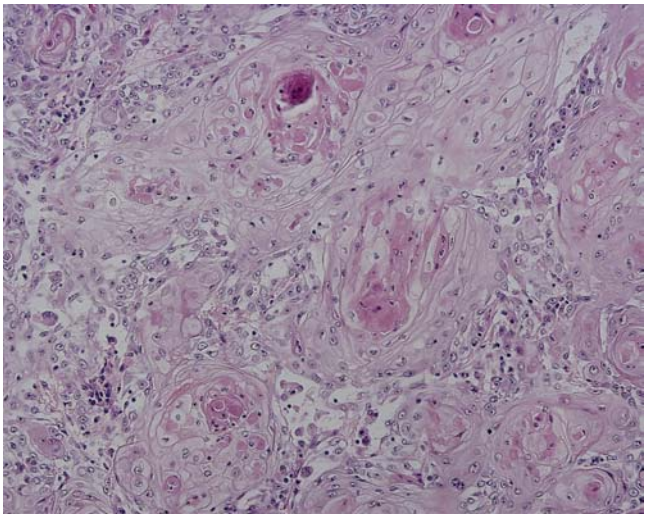

Fig. 2. Microscopic histopathological findings show well-differentiated squamos cell carcinoma. H&E

In summary, we reported a very rare case of primary gastric cancer that revealed SCC. The patient had received APR due to Dukes' C rectal cancer 6 years earlier. The gastric cancer grew

exophytically. In addition, based on the findings of two CT scans, we consider that the SCC of the stomach had grown rapidly in this patient.

Junko Hara, Hideki Masuda, Yukimoto Ishii, Nobuhiko Aoki, Hisashi Nakayama, Keniti Komura, Hideaki Karube, Tomoya Funada,
Department of Surgery, Nerima Hikarigaoka Hospital, Nihon University School of Medicine, 2-11-1 Hikarigaoka, Nerima-ku, Tokyo 179-0072, Japan

Akihiro Hemmi
Department of Pathology, Nihon University School of Medicine, Tokyo, Japan

Tadatoshi Takayama
Third Department of Surgery, Nihon University School of Medicine, Tokyo, Japan

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Fulminant ulcerative colitis during pregnancy successfully treated by three-stage operation

To the Editor: Ulcerative colitis has a variable clinical course, and each year approximately one-third of patients experience a symptomatic exacerbation of the disease. Because the initial presentation of ulcerative colitis usually occurs in the early adult years, it is not usual for colitis to manifest or to relapse during pregnancy. Although fulminant colitis is known to be associated with increased maternal and fetal mortality,[3–5] therapeutic strategies for such pregnant patients have rarely been reported. The indications for a three-stage operation are obvious in ulcerative colitis patients with intractable hemorrhage, fulminant colitis, toxic megacolon, or perforation. In the difficult situation of fulminant ulcerative colitis during pregnancy, a staged operation may also be selected. In this report, we describe our experience of a patient with ulcerative colitis during pregnancy for whom we employed a three-stage operation strategy and succeeded in saving both mother and fetus.

The case we report was a 23-year-old woman who had been diagnosed as having ulcerative colitis at age 17 years. During her first pregnancy, she had remained in remission, but in the eighth week of her second pregnancy, she relapsed and progressed to severe colitis; she was admitted to our hospital on January 31, 2001. She had a 2-week history of attacks of severe bloody diarrhea, of more than 10 times a day, low-abdominal pain, and tenesmus. On admission, she was slightly pale and afebrile, with a pulse rate of 100 beats/min. Laboratory studies showed: hemoglobin, 10.5 g/dl; white cell count, 10.7×10^3/ml; and serum albumin, 3.1 g/dl. Colonoscopy showed an edematous mucosa with contact bleeding, interpreted as severe colitis, from the anal verge to the sigmoid colon. Abdominal ultrasonography showed that the fetus and amniotic fluid were well within the normal parameters. She was treated with intravenous fluids, broadspectrum parenteral antibiotics, and systemic steroids (Predonine 60 mg/day; prednisolone). Despite being on this regimen, she continued to have 10 to 15 attacks of bloody diarrhea daily. Transfusions of blood and plasma were given. Ten days after admission, the patient's condition deteriorated. She complained of increasing abdominal pain and abdominal distention, and her temperature was up to 38.5°C. We suspected fulminant ulcerative colitis (denfined as a severe form of colitis that may be complicated by toxic megacolon). In the twelfth week of pregnancy, following a failed trial of medical therapy, she undewent laparotomy. At laparotomy, the transverse and sigmoid colon were severely inflamed and dilated, suggestive of toxic megacolon. But the rectum appeared normal, as did the small intestine. The gravid uterus was swollen (approximately 10 cm in size), and it occupied a large part of the pelvic space. We judged that bringing out the distal sigmoid colon through a suprapubic stab wound as a mucous fistula would be hindered by the broad ligaments, draped across the abdominal cavity from the enlarged uterus. So we selected subtotal colectomy with Hartmann's procedure, and the end ileostomy was placed rather higher on the abdominal wall than usual. Histopathological examination of the excised colon showed severe pancolitis with pseudopolyposis, and there was intense chronic inflammatory cell infiltration of the mucosa and submucosa with crypt abscess formation.

There was a sustained clinical improvement in the patient after the operation, without complications. She was discharged on March 2, 2001. After she delivered a healthy boy vaginally, the second stage of the operation (restorative proctocolectomy, ileal J-pouch anal anastomosis, diverting ileostomy construction) was performed, on December 4, 2001. Three months later, ileostomy closure was performed. She remains well and has complete continence with bowel movements five times per day.

The understanding of ulcerative colitis in pregnancy is incomplete, because it is based on retrospective studies of small numbers of patients. Approximately 30% of women with quiescent ulcerative colitis at the time of conception will relapse during pregnancy or puerperium.[1,2] This proportion is similar to that of comparable nonpregnant patients in the same time period.[2] In addition, if the colitis is active at the beginning of the pregnancy, it is likely that it will remain active or even deteriorate.[1] Although the biological reason for these observations is unknown, the altered endocrine environment and changing immune responsiveness prevailing at different times during pregnancy have been suggested as explanations.[10]

Truelove et al.[3] reported that intensive steroid therapy would lead to regression of disease in up to 75% of patients with severe colitis, and there are reports of intensive medical treatment of fulminant colitis inducing remission in pregnancy. However, patients who fail to respond to medical therapy may require surgical intervention. From the surgical point of view, it seems very difficult to perform total proctocolectomy with an ileal J-pouch anal anastomosis and diverting ileostomy during pregnacny, because of the enlarged uterus. Cookesy et al.[6] reported the pertinent