CASE REPORT

A 67-year-old woman presented with abdominal fullness and cramping pain, poor appetite and hiccup for more than 10 days. Several reddish, firm, asymptomatic nodules on the peri-umbilical area (Fig. 1) were also noted. Biopsy of the umbilical nodule showed that the dermis was diffusely infiltrated by ductal and tubular structures. A grenz zone was evident and the epidermis was relatively spared (Fig. 2A). In higher magnification, many irregularly shaped glandular structures infiltrate among the collagen bundles. The tubules were composed of pleomorphic, hyperchromatic cells with high nuclear to cytoplasm ratio. Some lumens shared a common wall indicating lost of polarity (Fig. 2B). Immunohistochemical staining showed diffuse positive for cytokeratin 7 (CK7), focally positive for carcinoembryonic antigen (CEA), and negative for cytokeratin 20 (CK20). We also arranged panendoscopy and colonoscopy, and both of the biopsies revealed adenocarcinoma. The abdominal echo revealed multiple heterogenous hypoechoic nodules over both lobes of liver and spleen. Panendoscopy showed a smooth protrusion into the gastric mucosa, suggesting compression by a external mass. Computed tomography (CT) scan of the abdomen revealed an irregular soft tissue mass located in the left upper abdomen with indistinct borders and multiple metastasis. The largest tumor was located at the pancreatic tail (Fig. 3).
DIAGNOSIS: Metastatic Adenocarcinoma Presenting as Sister Mary Joseph’s Nodule (SMJN)

DISCUSSION
A metastatic umbilical nodule was first described in 1847, but the first complete case study of this phenomenon was reported by Storer in 1864. The umbilicus has been regarded as a site of predilection of cutaneous metastases by some authors; ranged from 3 to 15 percent.1,2 Histologic study revealed that the vast majority were adenocarcinomas. Galvan reported that the most common origins of SMJN are gastrointestinal (52%), gynecologic (28%), stomach (23%), and ovarian (16%) cancer.3 In the Japanese literature, Ishizawa et al. also reported that the most common origins of SMJN are stomach (40%), pancreas (18.8%), ovary (13%), and colon (11.3%).3

The SMJN was usually found preceding the diagnosis of the primary tumor. The panendoscopy showed an external mass compressing the gastric mucosa, which did not belong to Borrmann classification of advanced gastric cancer. Histopathology of gastric tumor, colonic tumor, and SMJN showed moderately to poorly differentiated adenocarcinoma, suggested the upper gastrointestinal tract origin. Although the largest tumor at the pancreatic tail seen in the CT scan was probably the most possible primary neoplasm; however, it cannot be confirmed without surgical pathology.

Patients presented with an umbilical nodule often do not have other signs of internal malignancy. Therefore, comprehensive investigation of possible visceral malignancy is necessary in patients who have SMJN. Moreover, skin biopsy is mandatory to differentiate umbilical lesions from SMJN. Dermatologists must be aware of the diagnostic significance of this entity and the importance of histologic assessment of recently acquired umbilical lesions.

REFERENCES