

Narrow-band imaging of interdigitating dendritic cell sarcoma originating in the duodenum

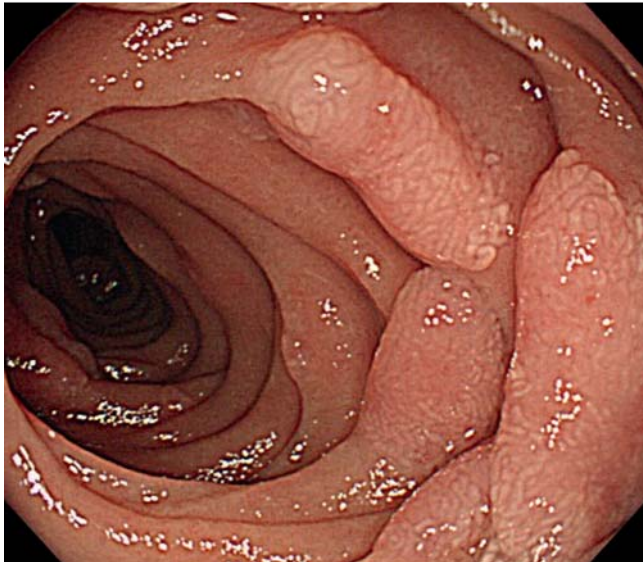


Fig. 1 Endoscopic view of the duodenum showing 5–15-mm saucer-like elevated lesions.

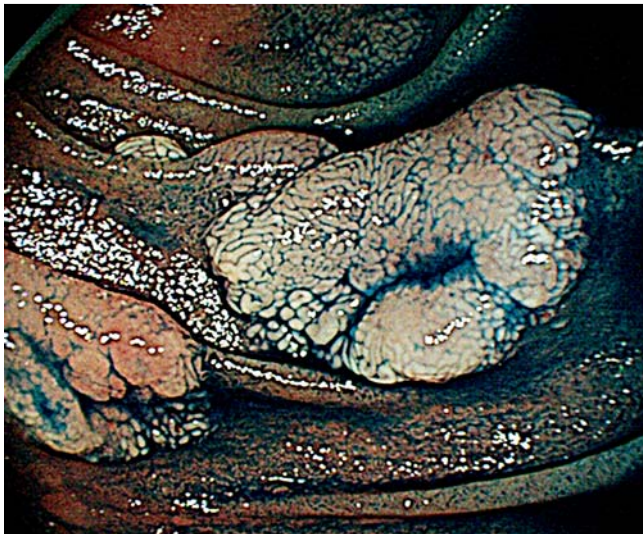


Fig. 2 Endoscopic view after spraying with indigo carmine dye.

Interdigitating dendritic cell sarcoma (IDCS) is an exceedingly rare neoplasm arising from the antigen-presenting cells of the immune system [1,2]. In general, IDCS is an aggressive tumor. The median overall duration of survival is 10 months [2,3]. This is the first report of magnifying endoscopic observation of IDCS using narrow-band imaging.

The patient was a 50-year-old man who had a history of ileal resection and lymph node dissection for an ileus caused by a tumor of the terminal ileum at another hospital. The diagnosis of malignant IDCS had been made histologically. He had not received adjuvant chemotherapy, but

there was no definite evidence of recurrence. However, 3 years after the operation, computed tomography revealed multiple lymph nodes in the cervical, supraclavicular, mediastinal, and para-aortic regions, and he was referred to our hospital.

Further examinations, including an upper gastrointestinal endoscopy and colonoscopy, were performed. Upper gastrointestinal endoscopy showed multiple whitish, saucer-like elevated lesions (5–15 mm in size) extending from the descending limb to the horizontal limb of the duodenum (Figs. 1 and 2).

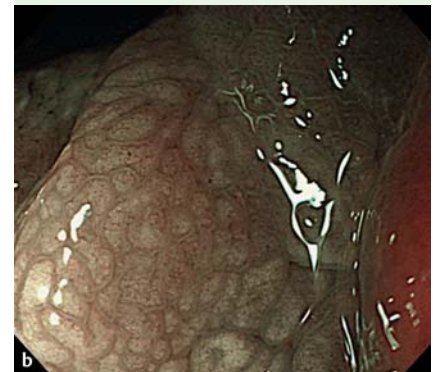
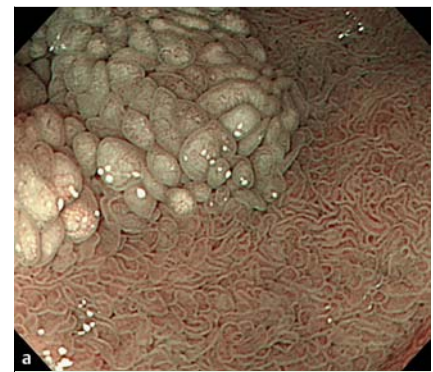


Fig. 3 a & b Magnifying narrow-band images of the lesions.

Magnifying narrow-band imaging (NBI) of the elevated lesions revealed a dense distribution of whitish, swollen villi, like moth eggs (Fig. 3).

Biopsy specimens obtained from these lesions showed oval- to spindle-shaped atypical cells infiltrating into the duodenum (Fig. 4).

Immunohistochemical staining revealed positivity with S100 protein and fascin. However, CD1a and CD21 were immunonegative (Fig. 5).

Based on histologic and immunohistochemical analysis, the histopathologic diagnosis of IDCS was confirmed, and biopsy of a cervical lymph node showed similar results.

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Competing interests: None

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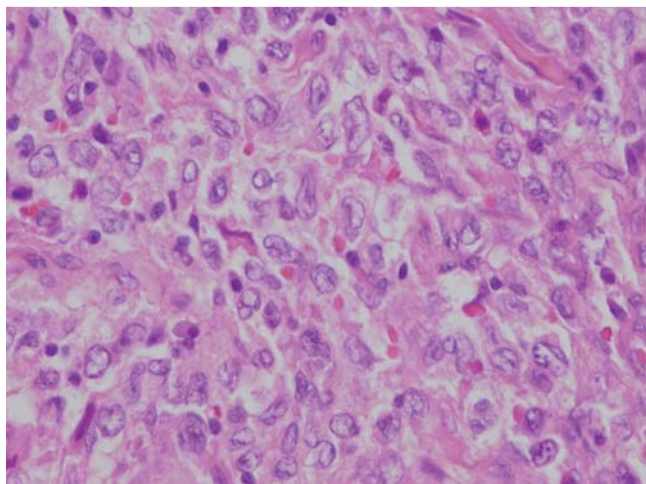


Fig. 4 Biopsy showing atypical cells (hematoxylin and eosin [H&E], magnification $\times 400$).

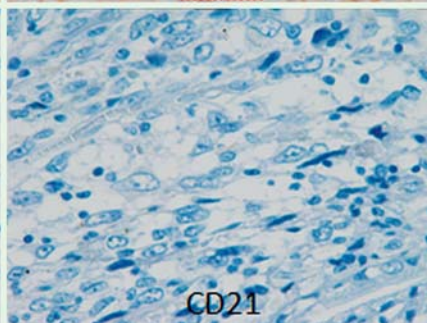
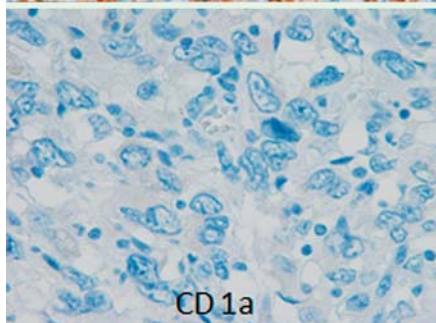
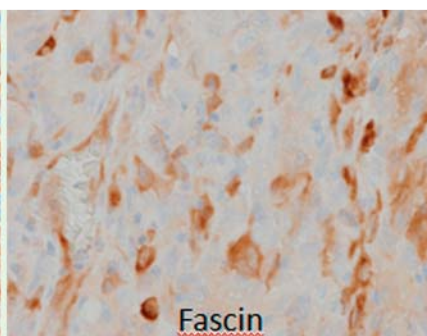
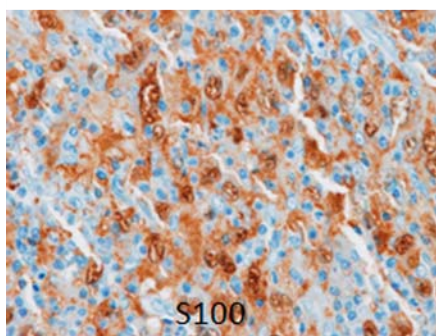


Fig. 5 Immunohistochemical staining revealed positivity with S100 and fascin. CD1a and CD21 were immuno-negative (magnification $\times 400$).

References

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Bibliography

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