

Angiosarcoma at the anastomotic site mimicking local recurrence of rectal adenocarcinoma

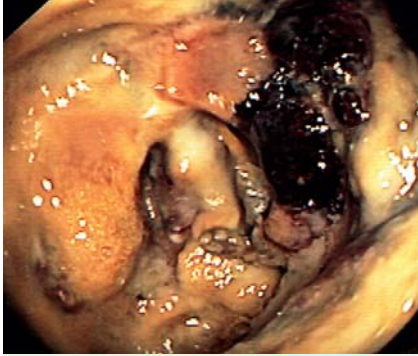


Fig. 1 Endoscopic appearance of a reddish partially necrotic mass at an anastomotic site after resection of rectal adenocarcinoma, which protrudes irregularly into the lumen, suspicious for local cancer recurrence.

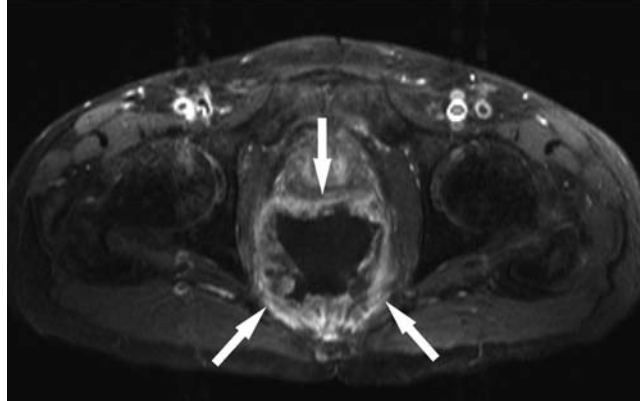


Fig. 2 Magnetic resonance imaging (MRI) of intrapelvic tumor, 8 cm maximum diameter, which diffusely infiltrated the wall of the rectum.

A 76-year-old man was diagnosed with rectal adenocarcinoma in January 2007. The patient underwent neoadjuvant radiochemotherapy followed by low anterior resection with total mesorectal excision. Histology showed foci of residual cancer tissue within the muscularis propria, and clear resection margins. Upon surveillance colonoscopy performed 3 years later, an irregular tumor mass was detected at the anastomosis, raising suspicion of a local cancer recurrence (● **Fig. 1**).

Magnetic resonance imaging showed an intrapelvic tumor (8 cm maximum diameter) diffusely infiltrating the bowel wall (● **Fig. 2**).

Histology revealed a malignant mesenchymal tumor with marked epithelioid cytomorphology and occasional cleft-like spaces, suggestive of vascular differentiation (● **Fig. 3**).

Diagnosis of angiosarcoma was confirmed by immunoreactivity for CD31, whereas markers of epithelial differentiation were negative.

Angiosarcomas occur very rarely in the intestinal tract as either primary or metastatic malignancy [1]. In publications, intestinal angiosarcomas appear only in small series and as occasional case reports [1,2]. In only two patients, tumor occurrence was related to antecedent radiotherapy or chemoradiotherapy [3,4]. One case occurred 8 years after radiotherapy for prostate cancer [3], the other, similar to our case, about 3 years after radioche-

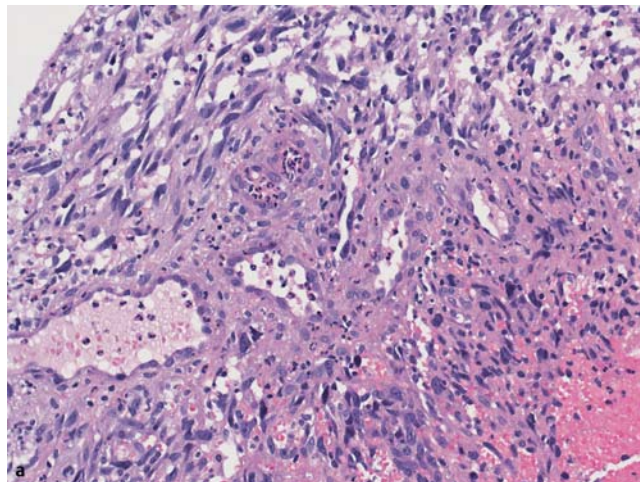
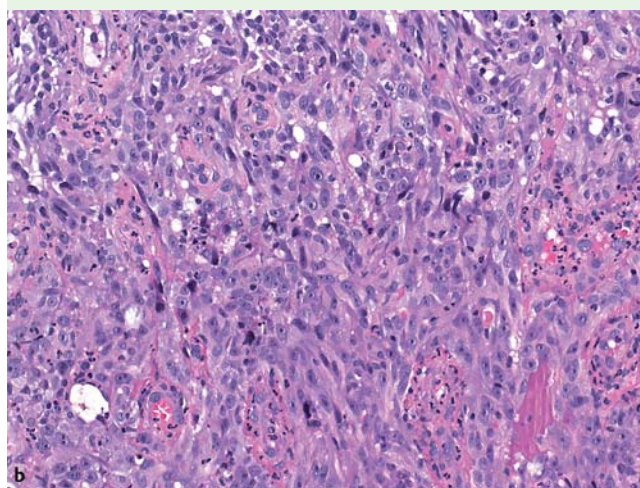


Fig. 3 Malignant mesenchymal tumor with cleft-like spaces, indicating: **a** vascular differentiation, **b** marked epithelioid cytomorphology.



motherapy for rectal cancer [4]. Although ionizing radiation is one of the few known risk factors for angiosarcoma, a large-cohort study on more than 300000 cancer patients recently questioned this association [5].

In general, intestinal angiosarcomas run a dismal clinical course with high risk of local tumor recurrence and propensity for widespread dissemination [1]. Upon endoscopy, they may easily be mistaken for an epithelial malignancy, especially when

neoplastic growth is seen at an anastomotic site after cancer resection. Endoscopists should be aware of this diagnostic pitfall to avoid delay in the correct diagnosis and ensure timely oncologic treatment of patients with independent secondary tumors.

Endoscopy_UCTN_Code_CCL_1AD_2AC

Competing interests: None

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References

- 1 Allison KH, Yoder BJ, Bronner MP et al. Angiosarcoma involving the gastrointestinal tract: a series of primary and metastatic cases. *Am J Surg Pathol* 2004; 28: 298–307
- 2 Brown CJ, Falck VG, MacLean A. Angiosarcoma of the colon and rectum: report of a case and review of the literature. *Dis Colon Rectum* 2004; 47: 2202–2207
- 3 Ahmad A, Jamieson T, Balsitis M, Diament R. Radiation-induced angiosarcoma of the rectum: a case report and review of literature. *Colorectal Dis* 2008; 10: 847–848
- 4 Tardío JC, Nájera L, Alemany I et al. Rectal angiosarcoma after adjuvant chemoradiotherapy for adenocarcinoma of the rectum. *J Clin Oncol* 2009; 27: 116–117
- 5 Virtanen A, Pukkala E, Auvinen A. Angiosarcoma after radiotherapy: a cohort study of 332 163 Finnish cancer patients. *Br J Cancer* 2007; 97: 115–117

Bibliography

DOI 10.1055/s-0030-1256450

Endoscopy 2011; 43: E293–E294

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