

Are they related? A case of elevated IgG4 autoimmune pancreatitis and pancreatic cancer.

Matheus, Melissa M.D.*; Broceta, Abelardo M.D.**; Rios, Humberto M.D. Kantor, Micaella MD; Nasiff, Luis M.D.*** Rana, Zaid D.O.; Mohan, Karthik D.O.****

Department of Internal Medicine, Palmetto General Hospital, Hialeah, FL*. Department of Internal Medicine, Larkin Community Hospital Palm Spring Campus, Hialeah, FL**. Department of Gastroenterology, Larkin Community Hospital, Palm Springs Campus, Hialeah, FL***. Department of Gastroenterology, Larkin Community Hospital, South Miami Campus, South Miami, FL****

Introduction

IgG4 level has been recognized as a useful tool to differentiate between pancreatic cancer (PC) and autoimmune pancreatitis (AIP). However, there is lacking evidence regarding the risk of both of these diseases occurring concomitantly. We present a case of a patient with an elevated IgG4 level who was diagnosed with invasive pancreatic adenocarcinoma.

Case Presentation

A 65-year-old male with a past medical history significant for liver abscess, pulmonary embolism s/p IVC, hypertension, and GERD presents to the ED for 1 week of abdominal pain. On initial workup, findings were significant for elevated bilirubin (T bili: 5.3mg/dl; D: 3.0 mg/dl; I: 2.3mg/dl) and elevated liver enzymes (alk phos: 196; ALT: 412; AST: 237). CT abdomen showed a 2.9 cm ill-defined lesion of the pancreatic head. MRCP showed a dilated common bile duct (12.7mm) with a distal stricture and a short segment occlusion of the splenic and portal vein junction. Initial workup showed a IgG4 level of 287 mg/dl (normal low: 2-96mg/dl) and elevated Ca19-9 at 468. He was started on steroid therapy due to suspected AIP and instructed to follow up outpatient. A week later, was readmitted for jaundice where he underwent an EUS with pancreatic biopsy followed by ERCP and biliary stent placement. Pancreatic biopsies showed evidence of invasive adenocarcinoma with surrounding desmoplastic fibrotic response.

Discussion

AIP and PC may be difficult to differentiate from many mimicking entities which present with painless jaundice, new-onset diabetes mellitus, and elevation of tumor markers. IgG4 has been found to be elevated in PC where levels are usually less than a two-fold increase from baseline. In small studies, a threshold of 280mg/dl has been used to favor a diagnosis of AIP over PC. Nonetheless, elevated IgG4 levels alone cannot be used to exclude a diagnosis of PC. Elevated tumor markers specifically CA19-9 level > 150 U/mL and imaging may also aid in the differentiation of AIP from PC. Biopsy remains the gold standard for definitive diagnosis. In cases where biopsies may be of high risk, a short trial of glucocorticosteroids with clinically significant clinical and radiologic response favors a diagnosis of AIP. There are few cases reported of concomitant AIP and PC, such as in our patients, but there is a lack of clinically significant evidence to support this association. We look forward to further studies to assess the risk of PC in AIP and the development of future PC screening guidelines in AIP.

References

- Kamisawa T, Chen PY, Tu Y, et al. Pancreatic cancer with a high serum IgG4 concentration. *World J Gastroenterol.* 2006;12(38):6225-6228. doi:10.3748/wjg.v12.i38.6225
- Ghazale A, Chari ST, Smyrk TC, et al. Value of serum IgG4 in the diagnosis of autoimmune pancreatitis and in distinguishing it from pancreatic cancer. *Am J Gastroenterol.* 2007;102(8):1646-1653. doi:10.1111/j.1572-0241.2007.01264.x
- Dite P, Novotny I, Dvorackova J, et al. Pancreatic Solid Focal Lesions: Differential Diagnosis between Autoimmune Pancreatitis and Pancreatic Cancer. *Dig Dis.* 2019;37(5):416-421. doi:10.1159/000499762
- Chang MC, Liang PC, Jan S, et al. Increase diagnostic accuracy in differentiating focal type autoimmune pancreatitis from pancreatic cancer with combined serum IgG4 and CA19-9 levels. *Pancreatol.* 2014;14(5):366-372. doi:10.1016/j.pan.2014.07.010
- Hirano, K., Isayama, H., Tada, M. *et al.* Association between autoimmune pancreatitis and malignancy. *Clin J Gastroenterol* 7, 200–204 (2014). <https://doi.org/10.1007/s12328-014-0486-2>

“Painless Voluminous Rectal Bleeding: It’s Not Always a “Tic”: A Case of a Recto-Sigmoid Hemangioma.

Matheus, Melissa M.D.*; Koller, Adam D.O.*; Clabots, Diana M.D.*; Zaid, Rana D.O.**; Emmanuel McDonald, D.O.**.; Selub, Steven M.D.**; Mohan, Karthik D.O.**. Department of Internal Medicine, Palmetto General Hospital, Hialeah, FL*; Department of Gastroenterology, Larkin Community Hospital, South Miami Campus, South Miami, FL**

Introduction

Hemangiomas are known as benign vascular tumors and may present as multiple or solitary lesions. Very few cases of colonic hemangiomas have been reported in the literature. We present a case of rectal bleeding leading to a finding of recto-sigmoid hemangioma.

Case Presentation

A 31-year-old female with no past medical history presented to the ED with complaints of bright red blood per rectum (BRBPR). She admitted to having 4 days of blood clots associated with bowel movements, in addition to diffuse lower abdominal pain which has occurred intermittently and progressively worsened for the past two years. In Cuba, she was told she had a rectal tumor that was “inoperable”. Lab work on admission was significant for iron deficiency anemia. CT of the abdomen and pelvis with oral and IV contrast revealed findings consistent with active gastrointestinal (GI) bleed in the ascending colon, as well as a 2.5 cm pelvic mass. However, an IR arteriogram revealed a large segment of angiodysplasia in the ascending colon but no evidence of active GI bleed. Transvaginal ultrasound ruled out an adnexal mass. Sigmoidoscopy revealed a large recto-sigmoid mass suspicious of a hemangioma as well as surrounding vascular ectasias.

Images

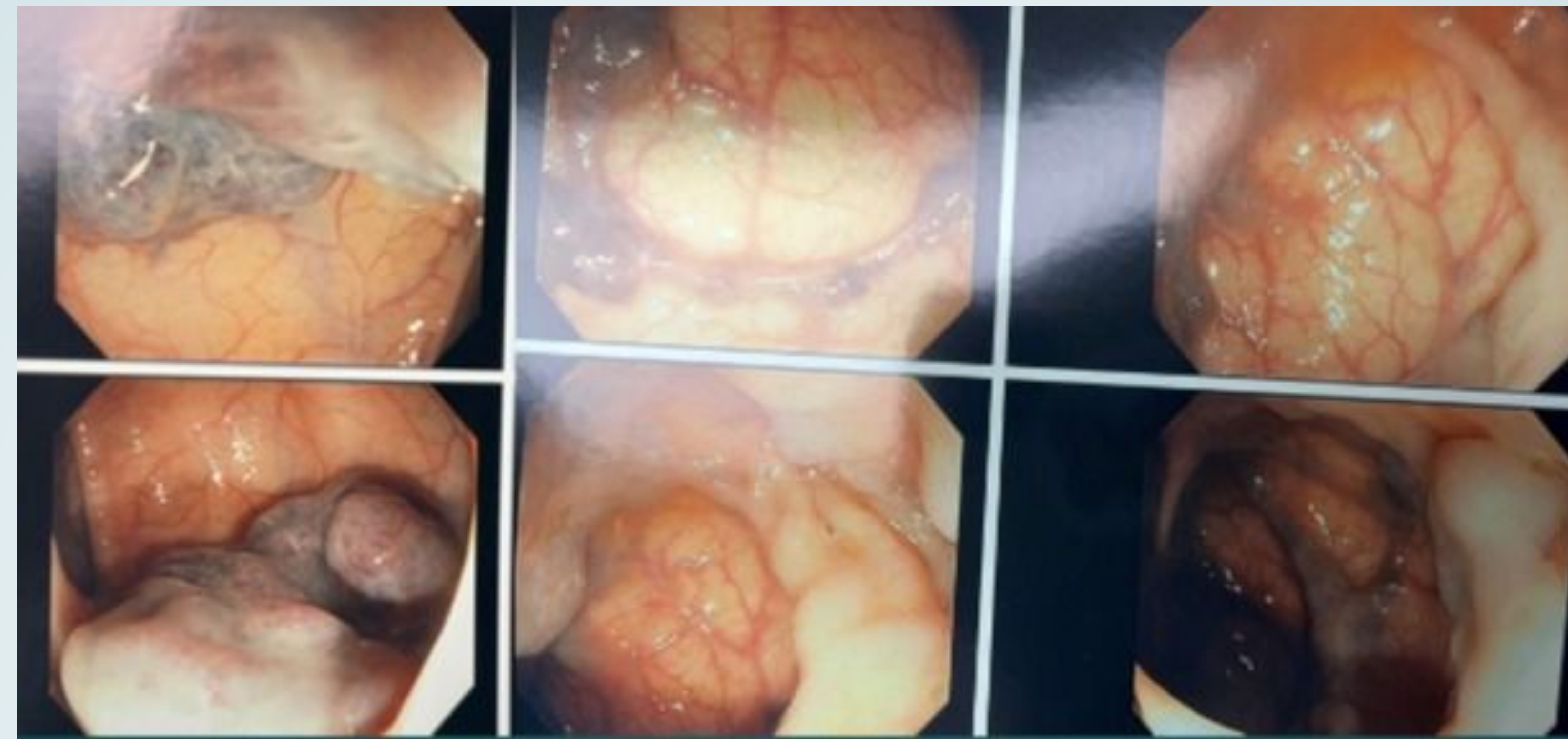


Figure 1. Extensive recto-sigmoid hemangioma with associated vascular ectasias.

Carefully taken biopsies revealed a benign rectal hemangioma. Ultimately, the patient was stabilized and discharged, with follow-up outpatient with surgical oncology due to the extent of her disease.

Discussion

Colonic hemangiomas are extremely rare benign vascular lesions of the GI tract. Often located in the recto-sigmoid, they may be discovered during workup for recurrent painless rectal bleeding and rarely present as life-threatening bleeding. Large cavernous hemangiomas may be associated with Kasabach-Merritt syndrome, hemolytic anemia, thrombosis, and bowel ischemia. Studies reveal that it may take on average up to 19 years before a proper diagnosis is established.

There are few reported cases of local invasion to surrounding structures such as the bladder and uterus. Despite being incidentally found in colonoscopy, insufflation may flatten these lesions which may be also misinterpreted as proctitis. Imaging studies such as MRI, CT, and rectal EUS are helpful in determining the diagnosis. Sclerotherapy, angiographic embolization, and ligation of mesenteric vessels may be attempted for small lesions. Surgical resection is generally the treatment of choice for more extensive lesions. Due to its mimicking presentation of common GI diseases, hemangiomas risk being overlooked. Given the rarity of this entity, treatment modalities for large rectal hemangiomas are solely surgery or monitoring. Given the advances in therapeutic endoscopic ultrasound, this may be a new modality that can avoid invasive surgical intervention.

References

- Plummer JM, Williams N, Johnson P, Lee MG. Left colon and liver hemangiomas. *Can J Surg.* 2009;52(5):E195-E196.
- Djouhri H, Arrivé L, Bouras T, Martin B, Monnier-Cholley L, Tubiana JM. MR imaging of diffuse cavernous hemangioma of the rectosigmoid colon. *AJR Am J Roentgenol.* 1998;171(2):413-417. doi:10.2214/ajr.171.2.9694466