Esophagogastroduodenoileal Crohn Disease: A rare presentation with an interesting differential

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Introduction

Esophagogastroduodenoileal involvement of Crohn disease is rare; less than 5% of adult patients will suffer from this condition. An interesting differential, including sarcoidosis, eosinophilic gastroenteritis, tuberculosis, and Brunner's gland hyperplasia, must be considered with this rare presentation.

Case

25 year old Caucasian male with 4 months of progressive watery diarrhea associated with nocturnal wakening, postprandial mid-epigastric pain associated with most food and liquid, and 10 pound weight loss.

Denied any fevers, chills, night sweats, sore throat, dysphagia, odynophagia, heartburn, regurgitation, nausea, vomiting, or hematemesis.

Clostridium difficile testing was negative. He had positive fecal occult blood test which prompted gastroenterology referral.

Gastroenterology Evaluation

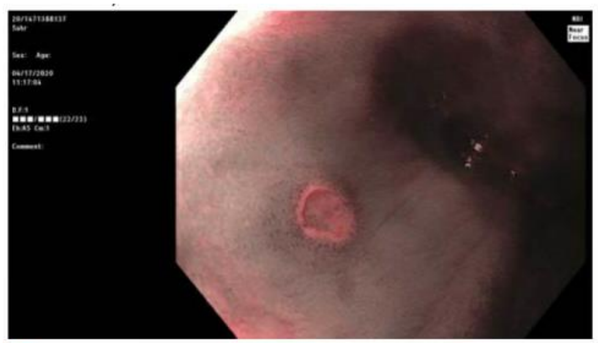
Ileocolonoscopic evaluation revealed terminal ileitis and otherwise normal colon.

Biopsies revealed active inflammation suggestive of Crohn's disease.

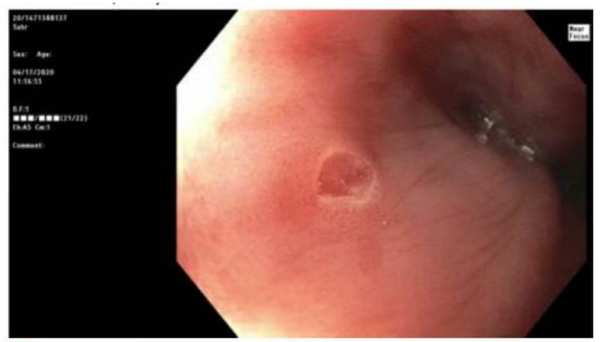
Due to persistent postprandial epigastric pain, an esophagogastroduodenoscopy (EGD) was performed, revealing two small ulcer-like mucosal abnormalities in the esophagus and scattered ulcerations in the stomach.

Biopsies revealed chronic, diffuse inflammation, focally active gastritis, focal granulomatous inflammation, and mild chronic duodenitis.

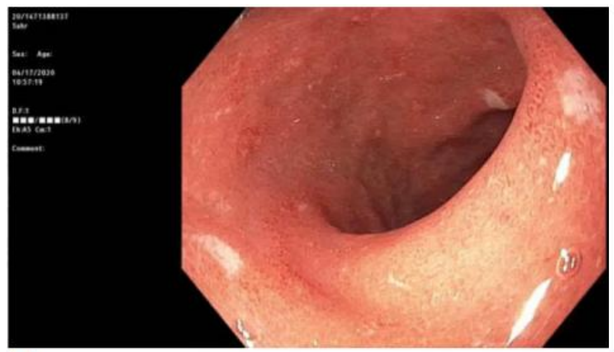
Biopsies were not suggestive of infectious etiologies. Fecal calprotectin was elevated at 1038 mcg/g.



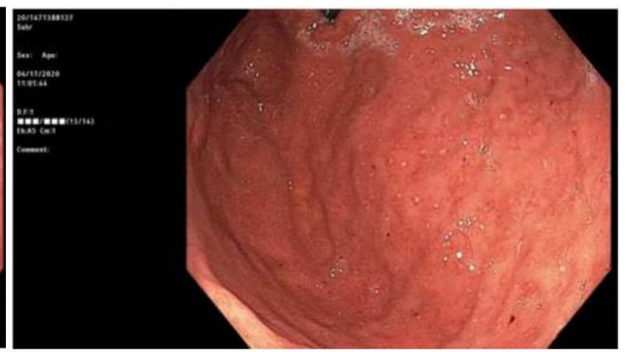
17 Middle Third of the Esophagus (esophageal lesion #2, 30 cm from incisors, NBI)



18 Middle Third of the Esophagus (esophageal lesion #2, 30 cm from incisors)



8 Duodenal Bulb (pathcy ulcerations and erythema)



12 Gastric Body (ulceations, erythema)

Differential

Findings of chronic inflammation and elevated calprotectin support inflammatory bowel disease, though upper gastrointestinal manifestations of Crohn disease is rare and prompted a work up of other potential etiologies that can present with similar features:

- Eosinophilic gastroenteritis and Brunner's gland hyperplasia were not seen on EGD and biopsy.
- Chronic gastritis and duodenitis were unlikely to be secondary to infectious etiology based on histology.
- Tuberculosis was ruled out with negative interferon-gamma release assay.
- Digestive tract sarcoidosis was considered, however chest radiograph was unremarkable for sarcoidosis, and ACE level was within normal limits at 36 U/L. Without pulmonary or extrapulmonary evidence, sarcoidosis was ruled out.

Conclusion

This case posed an interesting work up and differential for a rare presentation of Crohn disease. It is unclear why certain patients present in this manner, though it could be an underdiagnosed condition with most mild cases improving with proton pump inhibitor (PPI) use.

Of the limited data regarding treatment for this presentation, prednisone and PPIs appear to be efficacious.

Our patient was started on prednisone 40mg daily and Prilosec 40mg twice daily with significantly improved diarrheal and epigastric pain symptoms.

He was tapered off prednisone and started on Remicade 5mg/kg every 8 weeks after 3 loading doses and Imuran 50 mg and has had continued improvement in symptoms.

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