# A Case of Delayed Cervical Cancer Diagnosis in a Patient with Crohn's Disease

## **D** RUSH UNIVERSITY MEDICAL CENTER

#### Introduction

- Increased cancer risk in inflammatory bowel disease (IBD) is thought to be due to immunosuppression from biologic therapy and/or inflammation.
- Women with IBD have an increased risk of melanoma and adenocarcinoma of the small bowel and colon, and those that are on an immunosuppressive regimen including azathioprine have an additional increased risk of lymphoma and squamous cell carcinoma of the skin and cervix.
- Here we present a case of a patient with an atypical and rare malignancy, whose diagnosis was delayed due to overlap in the symptoms of the malignancy and her known IBD diagnosis.

#### **Initial Presentation**

- A woman in her mid 40s with a 28-year history of colonic Crohn's disease maintained on ustekinumab infusion
- She was previously taking azathioprine for 7 years and initially responded to adalimumab, but after a flare, was switched to ustekinumab with symptomatic and endoscopic response.
- She then presented to her gynecologist in November 2020 with complaints of bloating and large amounts of clear vaginal discharge.
- A cervical exam and routine pap smear of the ectocervix showed normal cytology.
- The patient was concerned for an IBD flare but noted that the abdominal bloating and vaginal discharge were different than her usual flare.
- CT abdomen/pelvis revealed 2 large pelvic complex cystic lesions, and pathology revealed non-HPV associated invasive moderately differentiated (stage IIb) gastric-type endocervical adenocarcinoma.

Manavi Bhagwat, MD, Michelle Godbee, MD MPH, Ali Keshavarzian, MD Rush University Medical Center, Chicago, IL

### Imaging





Figure 1a and b. Axial (a) and sagittal (b) CT image of abdomen/pelvis showing intramural fat stratification in descending colon consistent with known inflammatory bowel disease, as well as scattered peritoneal nodularity and abdominopelvic ascites consistent with peritoneal carcinomatosis.

- carcinomatosis.
- adenocarcinoma.

- endocervical sampling.

#### **Hospital Course**

• She completed treatment with an anti-VEGF antibody, but a restaging PET scan six months later showed uptake consistent with peritoneal

Sampling of cytology of peritoneal fluid was consistent with newly diagnosed metastatic

 She then underwent infragastric infracolic omentectomy and optimal tumor debulking concurrent with exploratory laparotomy and colon resection, which she tolerated well.

#### Discussion

 This immunosuppressed patient had an advanced and aggressive non-HPV endocervical cancer which was missed on ectocervical pap smear.

Pap smears that include inadequate endocervical samples are considered suboptimal, but do not necessitate repeat screening in the immunocompetent patient.

However, Crohn's disease patients have increased risk of low- and high-grade squamous epithelial cervical lesions and cervical cancer compared to women without IBD, likely due to a combination of elevated inflammatory state and immunosuppressive medications.

In this patient's case, lack of adequate endocervical sampling resulted in false negative cervical cancer screening and could have contributed to delay in diagnosis.

Cervical cancer screening in immunosuppressed patients with IBD should include adequate