# Case Report

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# An Interesting Cause of Abdominal Pain in the Emergency Room

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#### Abstract

In this case report, we aimed to present a case of abdominal pain who presented to the emergency department with complaints of abdominal pain and constipation for 2 days. A 76-year-old woman presented to our emergency department with complaints of abdominal pain and constipation for 2 days. Physical examination revealed a distended abdomen, diffuse tenderness and hypoactive bowel sounds. Abdominal plain abdominal radiography showed approximately 10-12 similarly shaped hyperdense foreign bodies (long dimension measured 15 mm and short dimension measured 5 mm) in the left lower quadrant and left upper quadrant. Abdominal computed tomography showed similarly shaped nodular foreign bodies with dense calcific-metallic characteristic foreign bodies with different locations and contents, one in the stomach and the others in the colon. The next day, black stools were added to her complaints. Endoscopy and colonoscopy performed 3 days later revealed no nodular foreign body with calcific-metallic appearance. The patient was followed up by the gastroenterology department and discharged after her general condition improved. It should be kept in mind that atypical eating disorders may underlie high-density calcific-metallic nodular lesions in the stomach and intestines in patients presenting with abdominal pain.

Keywords: Abdominal pain, constipation, eating disorders, radiology

#### Introduction

Abdominal pain is a common cause of emergency department admissions. It is challenging and high of readmissions. Careful evaluation and systematic approach towards the cause prevents overlooking potentially serious conditions (1).

Many blood tests and imaging methods, including direct radiography, ultrasound and tomography, are used in diagnosis.

In this case report, we aimed to present an interesting case of abdominal pain who presented to the emergency department with complaints of abdominal pain and constipation for 2 days.

#### **Case Report**

A 76-year-old woman presented to our emergency department with complaints of abdominal pain and constipation for 2 days. In her anamnesis, she stated that she had frequent constipation complaints before. Her medical history included asthma, hypertension (HT), anxiety, total abdominal hysterectomy + bilateral salpingooopherectomy

(TAH+BSO), and appendectomy. On physical examination, the patient's general condition was good, oriented, cooperative and vital signs were fever: 36.5°C, pulse rate: 103/min, blood pressure: 110/70mmHg, respiratory rate: 16/min. The abdomen was distended, there was diffuse tenderness and bowel sounds were hypoactive (2-4/ min). Blood tests revealed white blood cell count (WBC) 13,800 /mm3, hemoglobin count (Hgb) 6.9 g/dL, lactate 2.5 mmol/L. She was otherwise normal. Standing plain abdominal radiography (SPAR) revealed approximately 10-12 similarly shaped hyperdense foreign bodies (long dimension measured 15 mm and short dimension measured 5 mm) in the left lower quadrant and left upper quadrant (Figure-1). Subsequently, abdominal computed tomography (CT) performed for differential diagnosis showed nodular foreign bodies with dense calcific-metallic character with different locations and contents, one in the stomach and the others in the colon, measuring 15 mm at the most prominent location, with a density of 2500-3000 HU (Figure-2). General surgery and internal medicine consultations were requested. General surgery did not consider emergency surgery and recommended outpatient clinic. The patient left the hospital voluntarily without waiting for internal medicine consultation.

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Figure 1. Hyperdense foreign bodies on standing plain abdominal radiography



Figure 2. Nodular foreign bodies with dense calcific-metallic character on abdominal computed tomography

The next day, the patient's complaints increased and vomiting and black stools were added to her complaints. The patient's general condition was poor and rectal examination revealed melena. In blood tests, leukocytosis, anemia and lactate level deteriorated further (Hgb: 4.9 g/dL, lactate: 5.8 mmol/L). The patient was consulted to the gastroenterology department considering gastrointestinal system (GIS) bleeding. The patient was hospitalized in the intensive care unit with a prediagnosis of GI bleeding for further investigations and treatment. Endoscopy performed 3 days later revealed no nodular foreign body with calcific-metallic appearance, but a large submucosal mass on the posterior wall of the gastric antrum-corpus junction, approximately 6

cm in size, with 2 white exudate ulcers of 6-7 mm in size. This vision was consistent with gastrointestinal stromal tumor (GIST). The patient showed clinical improvement in the follow-up and was discharged with a recommendation for general surgery outpatient clinic control.

#### Discussion

Abdominal pain is a common condition that accounts for 5-10% of emergency department admissions. However, 20% to 30% of patients with abdominal pain leave the hospital without a definitive diagnosis (2).

Laboratory and imaging methods are used in the diagnosis and differential diagnosis of diseases underlying abdominal pain (3-6). In our case, we ordered blood tests for abdominal pain. Blood tests revealed leukocytosis, anemia and elevated lactate levels. SPAR and CT scans were then ordered as imaging modalities. SPAR revealed approximately 10-12 similarly shaped hyperdense foreign bodies in the left lower and left upper quadrants. Subsequently, an abdominal CT scan confirmed the presence of foreign bodies in the stomach and colon and excluded other possible causes of abdominal pain.

Afterwards, the patient developed melena and gastroenterology department was consulted considering GIS bleeding. Endoscopy and colonoscopy were performed by the gastroenterology department 3 days later. No nodular foreign bodies with calcific-metallic appearance were detected in endoscopy and a large submucosal lesion compatible with GIST with 2 white exudate ulcers was observed on the posterior wall of the gastric antrum - corpus junction. When the patient's previous examinations were examined, endoscopy and colonoscopy performed 5 months ago due to the patient's anemia showed no metallic appearance and SPAR performed 6 months ago showed no hyperdense image.

We considered atypical eating disorder as the cause of the foreign bodies present in the patient. Atypical eating disorders are eating behaviour disorders that lead to medical, social and psychological problems and affect quality of life negatively (7,8). Epidemiologic risk factors for atypical eating disorders include cultural characteristics, gender, age, mental disorders in the family, family lifestyle, socioeconomic class, personality role, previous psychological disorders, genetics, sexual orientation and occupation (9). Atypical eating disorder are based on a type of self-injurious behaviour involving the ingestion of non-nutritive objects. The result is usually excretion of the ingested substances through feces, but rarely requires surgical intervention (10). Our patient was an elderly woman with anxiety disorder and psychiatric drug use. We thought that the patient had atypical eating disorder and the high-density calcific-metallic nodular lesions on imaging to be excreted through feces.

### Conclusion

It should be kept in mind that patients presenting with abdominal pain may have atypical eating disorders underlying the high-density calcific-metallic nodular lesions seen in the stomach and intestines in imaging methods.

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