

Epiploic Appendagitis in a 46 Year Old Pregnant Female

Epiploik Apendagitis; 46 Yaşında Gebe Kadın
Kadın Hastalıkları ve Doğum

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Özet

Nadir bir durum olan Epiploik apendagitis (EA) gebelerde diğer nonobstetrik akut batın nedenleri ile ayırıcı tanısı güç olan bir hastalıktır. Gebeliğe bağlı situs değişiklikleri ve tanıda abdominal bilgisayarlı tomografinin kullanılmamasındaki çekinceler tanının gecikmesine neden olur. Bu yazıda, nonspesifik karın ağrısı ile acil servise başvuran 46 yaşındaki, gravida 5, parite 4, 37 haftalık gebeliği olan hasta, akut batın kliniğinin ilerlemesi sonrasında akut apandisit tanısıyla laparotomiye alınmıştır. Hastaya intraoperatif epiploik apandisit tanısı konulmuştur. Nadir görülen bir klinik tablo olan, spesifik semptom ve bulgusu olmayan ve kendini sınırlayabilen epiploik apendagitisin diğer nonobstetrik akut batın nedenleri ile ayırıcı tanısı her zaman yapılamayabilir. Tanıda bilgisayarlı tomografi önemli olmasına rağmen gebelerde kullanımındaki çekinceler nedeniyle genellikle tanı laparotomi sırasında konulur. Ayırıcı tanıda hastalığın düşünülmesi önemlidir. Bununla birlikte detaylı anamnez ve fizik muayene ile gerekli laboratuvar tetkikleri kullanılmalı ve nonobstetrik akut batın tanısında gebeliğin oluşturduğu zorluklar dikkate alınmalıdır.

Anahtar kelimeler: *Gebelik, Akut batın Epiploik apendagitis*

Abstract

Epiploic appendagitis (EA) is a rare condition that, if it occurs during pregnancy, has a difficult differential diagnosis due to the possibility of other nonobstetrical acute abdomen etiologies. Displacement of the visceral organs in pregnancy and uncertainties regarding the use of abdominal computed tomography can cause delayed diagnosis. A 46-year-old gravida 5, para 4 woman at 37 weeks' gestation presented to the emergency department with nonspecific abdominal pain, was diagnosed with epiploic appendagitis during laparotomy performed due to worsening clinical progress of the acute abdomen. EA is a rare, self-limiting clinical condition without any specific symptoms or findings, and differential diagnosis of this disease cannot always be established due to other possible non-obstetrical acute abdomen etiologies. Although computed tomography is important in diagnosis, there are the doubts about its use in pregnancy, so diagnosis in pregnant women is generally ascertained during laparotomy. In the differential diagnosis, this disease should come to mind, a detailed history and physical examination with essential laboratory examinations should be performed, and the difficulties of a non-obstetrical "acute abdomen" diagnosis in pregnancy should be considered.

Keywords: *Pregnancy, Acute abdomen Epiploic appendagitis*

Introduction

Appendix epiploica is a fat containing, 0.5-5 cm long peritoneal pouch derived from the serosal surface of the colon and attached to the colon wall via its vascular peduncle, containing a single arteriole and a venule. Epiploic appendagitis (EA) is a very rare condition that is due to acute ischemic inflammation of an appendix epiploica caused by torsion or spontaneous venous thrombosis¹. Disease occurred in the region of inflammation can mimic the severe and focal abdominal pain symptoms of the other acute abdomen etiologies, such as acute appendicitis and diverticulitis²⁻⁴. While an early diagnosis is essential for preventing mortality and morbidity; symptoms and clinical and laboratory findings are generally insufficient for diagnosis. Abdominal computed

tomography (CT) has important role in the differential diagnosis prior to surgery in order to avoid needless surgical interventions⁵, since conservative treatment can be used in nontoxic patients⁶. Due to uncertainties about X-ray usage in pregnancy and displacement of the visceral organs during pregnancy, the differential diagnosis can be delayed⁷. Thus, many cases are diagnosed during laparotomy according to the decision based on clinical manifestations.

Case Report

A 46-year-old woman at 37 weeks' gestation with a history of 4 natural childbirths, right facial paralysis, and hypothyroidism presented to the emergency department complaining of right lower quadrant pain for 2 days. She also complained of nausea, vomiting, anorexia and constipation.

The physical examination showed a blood pressure of 100/60 mmHg; pulse rate of 98 beats/min. and body temperature of 37.8 °C. There was no marked tenderness in the right lower quadrant, rebound or guarding. On pelvic examination, cervical dilatation was 1 cm and there was no amniotic fluid leakage.

Laboratory findings showed hemoglobin and white blood cell (WBC) count of 12.2 gr/dl and 14.1 K/uL, respectively. Abdominal ultrasonography (USG) showed diffuse gas artifact in the abdomen and 5-6 reactive lymph nodes with hili in the right inguinal region. In the uterine cavity, a 37 week single live fetus was detected in a cephalic presentation, and decreased amniotic fluid was measured.

At first, the patient was admitted to the hospital for observation of atypical abdominal pain. In her follow up period, she began to have right lower quadrant tenderness, rebound and guarding. When the WBC measured 18.1 K/uL and C-reactive protein (CRP) was 78.2, the patient underwent to urgent laparotomy with a preliminary diagnosis of 37 week-pregnancy and acute appendicitis.

After entering to the abdomen via a Pfannenstiel incision, a live male baby was delivered via a lower segment transverse incision into the uterus. After closure of the uterus, intraabdominal exploration revealed a necrotized EA attached to the appendix stem near the sigmoid-descending colon junction (Figure 1).



Figure 1

Necrotized epiploic appendagitis attached to the appendix

EA was dissected from nearby tissues, and since the appendix was inflamed, it was excised by appendectomy. The abdominal incision was closed after bleeding was controlled. The patient was discharged with cure after an unremarkable postoperative course.

Discussion

Epiploic appendagitis is a rare clinical entity without any specific findings or symptoms. Its differential diagnosis cannot always be distinguished from the other acute abdominal etiologies, such as acute appendicitis and diverticulitis. Nonspecific symptoms and findings make this condition more difficult to diagnose in pregnancy. The uncomplicated disease usually limits itself with medical treatment. After necrosis settles down, symptoms recede and the EA spontaneously resorbs⁸. Therefore, preoperative diagnosis is important. Although CT is important in preoperative diagnosis⁹⁻¹¹, it is generally diagnosed with laparotomy in pregnant women due to doubts about its use in pregnancy. USG is of limited importance in EA diagnosis, due to anatomic changes and gas distension in pregnancy. However, USG can identify a nonspecific image of a hyperechoic mass that is oval-shaped, noncompressible, and without blood flow on Doppler beneath the point of tenderness¹². The most important factor in diagnosis is to keep this disease in mind for the differential diagnosis.

In pregnancy, diagnosis is usually during laparotomy or EA is misdiagnosed in cases of spontaneous regression. This can cause uncertainty about the actual incidence of this disease. In our case, due to the advanced gestational week and dense gas distension, no finding assisting the diagnosis was detected on USG. CT imaging could not be used because of the pregnancy. After the patient's clinical manifestations and laboratory findings were considered, she underwent laparotomy with a preoperative diagnosis of acute appendicitis.

In conclusion, while keeping EA in mind for the differential diagnosis; a detailed history, physical examination, and laboratory investigations should be performed. The difficulties precipitated by pregnancy should be considered in the diagnosis of non-obstetrical acute abdomen.

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