รายงานผู้ป่วย

การดูแลผู้ป่วยตั้งครรภ์นอกมดลูกที่ท่อนำไข่แตกที่มีสัญญาณชีพปกติ

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Received: *October 18, 2021* **Revised:** *December 30, 2021* **Accepted:** *February 26, 2022*

บทคัดย่อ

การตั้งครรภ์นอกมดลูก คือการตั้งครรภ์ที่เกิดจากการฝังตัวของตัวอ่อนนอกโพรงมดลูก ร้อยละ 95 เกิดขึ้นที่ท่อนำไข่ อุบัติการณ์พบประมาณ 1:125 ถึง 1:200 ของการคลอดทั้งหมดแต่ในช่วง 10 ปีหลัง พบอุบัติการณ์การตั้งครรภ์นอกมดลูกเพิ่มขึ้น และพบบ่อยที่สุดของการตั้งครรภ์ในไตรมาสแรก วัตถุประสงค์เพื่อรายงานกรณีศึกษาผู้ป่วยตั้งครรภ์นอกมดลูกที่ท่อนำไข่แตก แต่ไม่มีภาวะช็อก

กรณีศึกษา ผู้ป่วยหญิงไทย อายุ 17 ปี มาโรงพยาบาลด้วยอาการปวดท้องน้อยและประจำเดือนไม่มา 3 เดือน แรกรับผู้ป่วยมีสัญญาณชีพปกติ ตรวจร่างกายพบภาวะท้องอืด กดเจ็บทั่วท้อง ยังไม่ได้ตรวจการตั้งครรภ์ ตรวจภายในเจ็บเมื่อโยกปากมดลูก ไม่มีเลือดออก ตรวจอัลตราซาวด์พบ free fluid at cul–de-sac and hepatorenal pouch ส่งปัสสาวะตรวจการตั้งครรภ์พบผลบวก จึงวินิจฉัยโรค rupture ectopic pregnancy with hemodynamically stable ผู้ป่วยได้รับคำแนะนำและการดูแลรักษาอย่างทันที และส่งผ่าตัดอย่างเร่งด่วน หลังจากผู้ป่วยพ้นภาวะวิกฤต ผู้ป่วยอาการดีขึ้นตามลำดับ และสามารถกลับบ้านได้ โดยไม่มีภาวะแทรกซ้อน

คำสำคัญ: การตั้งครรภ์นอกมดลูก, ตั้งครรภ์นอกมดลูกที่ท่อนำไข่แตก, สัญญาณชีพปกติ

CASE REPORT

Ruptured Tubal Pregnancy in A Hemodynamically Stable Patient: A Case Report

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ABSTRACT

An ectopic pregnancy is a pregnancy that is implanted outside of the uterine cavity. It is a life-threatening emergency condition in a first-trimester pregnancy.

A 17-year-old primigravida woman came to our department with a sudden onset of lower abdominal pain and a history of amenorrhea for three months. The patient's vital signs were stable. Physical examination showed mild tenderness on the lower abdomen with no signs of peritonitis. Pelvic examination revealed mild cervical motion tenderness, a slightly enlarged uterus, and a left adnexal mass. Ultrasonography showed a gestational sac with a viable fetus at 11 weeks of gestation, which was seen at the left adnexa with free fluid in the cul-de-sac and hepatorenal pouches. The patient was diagnosed with a ruptured ectopic pregnancy and consented to emergency exploratory laparotomy. Left salpingectomy was carried out. The patient improved gradually and was discharged without complication. However, this case was not an usual presentation of an ectopic pregnancy, and thus should be retained for differential diagnosis in pregnant women with uncertain clinical presentation and hemodynamic stability.

KEYWORDS: Ectopic pregnancy, Ruptured ectopic pregnancy, Hemodynamically stable, Viable fetus

INTRODUCTION

An ectopic pregnancy is a pregnancy that is implanted outside of the uterine cavity. The most common extra-uterine location is the fallopian tube, accounting for over 95 percent of all ectopic pregnancies. Its estimated incidence is about 1:125 to 1:200 births, but increases over time[1]. An ectopic pregnancy is the most common cause of death in the first trimester of pregnancy. Although an ectopic pregnancy has no definite risk factors, the risk can increase by several factors: previous ectopic pregnancy, history of pelvic inflammatory disease, tubal damage, history of infertility, increased age, and smoking. Most ectopic pregnancies are diagnosed between 6-10 weeks of gestation. Here, we described a case that involved a ruptured tubal pregnancy with a viable fetus in a hemodynamically stable patient[2].

CASE REPORT

A 17-year-old primigravida woman came to our department with a sudden onset of lower abdominal pain and a history of amenorrhea for three months. She was uncertain of her last menstrual period and had no previous antenatal care. She had no history of medical or obstetric conditions. Contraception was not a factor because she desired to get pregnant. There was no history of loss of consciousness, dizziness, or any other systemic symptoms, but heavy nausea and vomiting. Physical examination showed no pale conjunctivae and no icteric sclerae. The patient had persistent lower abdominal pain without radiation and signs of peritonitis. Pelvic examination revealed mild cervical motion tenderness, a slightly enlarged uterus, and a left adnexal mass. Laboratory investigation showed hemoglobin at 9.7 g/dl, hematocrit at 29%, white blood cells at 16,400 /mm^3, and platelets at 259,000 cells/ul. Her coagulation test, kidney, and liver function test appeared normal.

Transvaginal ultrasonography showed an empty uterus with an endometrial thickness of 2 cm. A gestational sac with a viable fetus at 11 weeks of gestation was seen at the left adnexa. Both ovaries were unremarkable. Free fluid was seen in the cul-de-sac correlated with free fluid in the hepatorenal pouch by transabdominal ultrasonography (Figure 1). The diagnosis of a ruptured ectopic pregnancy was possibly explained. The patient and her husband were counseled and consented to emergency laparotomy. During the operation, a total of 400 ml of hemoperitoneum was suctioned and a unit of pack red cells was given. The viable fetus at 11 weeks of gestation and other components of ectopic pregnancy were found along with a ruptured ampulla of the left fallopian tube. Left salpingectomy was done. Her postoperative vital signs were stable. Peri- and postoperative complications were not detected. The patient improved gradually and was discharged on the 4^{th} postoperative day.

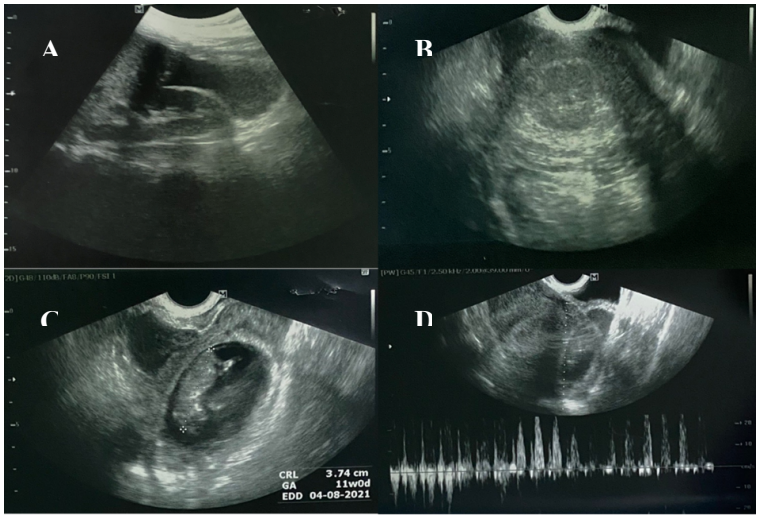

Fig 1 A: Transabdominal ultrasound exhibiting free fluid in the hepatorenal pouch
B: Cross-sectional view of an empty uterus
C, D: Transvaginal ultrasound of an extra-uterine pregnancy at the left adnexa

Gross examination of the left fallopian tube with a conceptive product was sent to pathology, which was then fixed in 10% formalin and routinely processed. Slides were stained with hematoxylin and eosin stain (H&E). Histopathological findings presented ruptured ectopic gestation; the fetus was approximately 4 centimeters in crown-rump length (CRL). Chorionic villi and trophoblastic cells were found both inside and outside the wall of the fallopian tube (Figure 2).

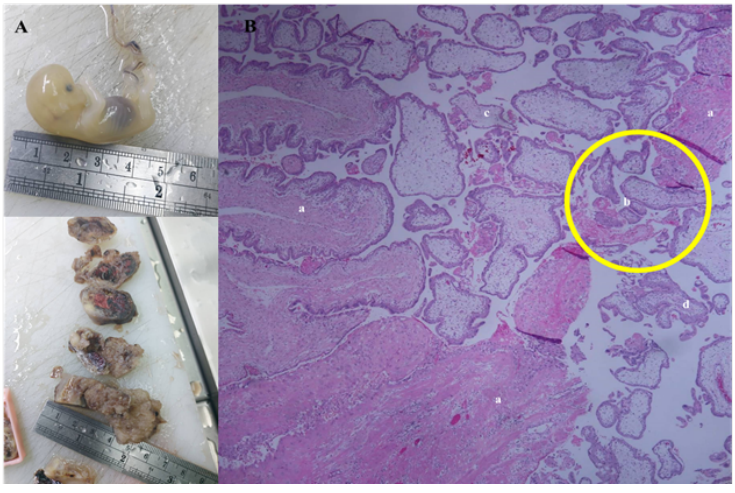

Fig 2 A: Gross, ruptured left tubal pregnancy with conceptus
B: H&E with (a) showing tubal epithelium, (b) showing tubal epithelium with the ruptured area, (c-d) showing chorionic villi with trophoblastic cell
C: In the wall of the fallopian tube, D: The outside of the fallopian tube

DISCUSSION

An ectopic pregnancy is a potentially life-threatening emergency condition in the first trimester of pregnancy. Most fetuses are not able to survive. It is a potentially major cause of maternal morbidity and mortality. The Centers for Disease Control and Prevention (CDC) reported that ectopic pregnancy accounted for 2% of all reported pregnancies[6]. From 2011 to 2013, a ruptured ectopic pregnancy was discovered in 2.7% of all pregnancies wherein the cause of death was due to hemorrhage. Although almost all ectopic pregnancies do not have risk factors, women who have significant risk factors should be assessed, even if they have an absent symptom. Patients with clinical presentations and physical examinations of a ruptured ectopi pregnancy, such as the acute abdomen, hemodynamic instability, vaginal bleeding, and anemia, should be evaluated urgently for proper management. Abdominal pain can be felt in a normal pregnancy, though the pain will be more severe in an ectopic pregnancy after 6-7 weeks of pregnancy. As the bleeding continues to increase during an ectopic pregnancy, the patient may faint, lose consciousness and even die without timely and appropriate treatment [3].

Ultrasonography and/or serum beta-human chorionic gonadotropin (hCG) are helpful for early diagnosis. There are several methods for the treatment of an ectopic pregnancy including supportive treatment and observation, medical treatment, and surgical treatment. The most suitable approach will depend on the severity of the disease. Supportive treatment was considered in patients with an asymptomatic ectopic pregnancy, and serum beta hCG had a reduction of more than 50% over 7 days[4]. Methotrexate is currently used to treat an uncomplicated ectopic pregnancy. However, this drug should be avoided by patients with abnormal liver, kidney, and bone marrow function. Although methotrexate therapy has been studied, the outcomes may vary depending on many factors among individual patients. Surgery can be performed both abdominally and laparoscopically depending on the availability of persons, surgical instruments, and patients' conditions[5]. In our case, the patient underwent emergency exploratory laparotomy due to ruptured tubal pregnancy with a significant amount of free fluid in the abdomen as seen by ultrasonography. However, interstitial pregnancy should be included in the differential diagnosis because of the high risk of maternal mortality. This interstitial pregnancy is frequently missed on ultrasonography but can be discovered during intra-operation.

SUMMARY

In summary, a ruptured tubal pregnancy with a viable fetus in a hemodynamically stable patient was described. However, an ectopic pregnancy can cause major maternal morbidity and mortality. Thus, it should be retained for differential diagnosis in pregnant women with uncertain clinical presentation and hemodynamic stability.

Conflicts of Interest: None

Financial Support: None

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