Case report

## Spontaneous ruptured and intact bilateral tubal ectopic pregnancy

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## **Case report**

A 35-year-old Iraqi woman (gravida 7, para 5 + 1 abortion) was admitted to the Jordanian field hospital in Fallujah, Iraq in January 2004 with a history of 8 weeks amenorrhoea; intermittent vaginal bleeding and mild lower abdominal pain of 4 weeks duration; and a positive urine pregnancy test on the day of admission. She had been married for 13 years. Her menstrual history was not relevant. There was no past history of contraception use or previous abdominopelvic surgery.

General examination revealed maternal tachycardia (pulse 110 per minute), hypotension (systolic/diastolic blood pressure 90/60 mmHg) and pallor. Her abdomen was tender on palpation with positive rebound and guarding.

On pelvic examination, there was mild spotting, the cervical os was closed and the cervix tender on transverse motion. The uterus was bulky; there was fullness in all the fornices with tenderness; and the adnexae were difficult to palpate. Haematological examination showed: white cell count  $8 \times 10^9$  cells/L, haemoglobin 8.5 g/dL and haematocrit 25%. Pelvic ultrasound examination showed bulky uterus, homogenous texture and mild thick endometrium with smooth outline. A moderate amount of fluid collection was present in the pouch of Douglas.

Emergency exploratory laparotomy revealed haemoperitoneum of approximately 800 mL. There was a ruptured fimbrial ectopic pregnancy with active bleeding on the right side. The left tube showed an intact ectopic pregnancy  $2 \text{ cm} \times 2 \text{ cm}$  in the ampullary region that was bleeding and forming an organized haematoma at the fimbrial end (Figure 1).

In view of these findings, right salpingectomy and left salpingostomy with cautery were carried out with removal of the product of conception. The patient received 2 units of type O Rh positive blood. Postoperative follow-up was uneventful and the patient was discharged on the 5th day post-operation.

Two weeks after surgery the beta subunit of human chorionic gonadotrophin was zero.

Histopathological examination of the specimens, excised right ruptured tube and the product of conception extracted from the left tube, confirmed the diagnosis. It revealed tubal tissues with decidua and chorionic villi on the right ruptured tube. Inflamed decidua with chorionic villi, but no tubal tissues, were seen on the specimen from the left side.

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Figure 1 Ruptured right and intact left tubal pregnancy

## Discussion

Spontaneous bilateral ectopic pregnancy is rare, therefore preoperative diagnosis is uncommon. The frequency of bilateral ectopic pregnancy has been estimated at 1/200 000 uterine pregnancies and 1/725–1/1580 ectopic pregnancies. [1]. In the past 20 years a 3-fold increase in the incidence has been observed. [2] Heterotopic as well as bilateral tubal ectopic pregnancies are seen after the introduction of assisted reproductive treatment [3,4,5,6]. The occurrence of spontaneous bilateral ectopic pregnancy is, however, exceedingly rare [1,7,8].

We report a very rare case of spontaneous ruptured and intact bilateral ectopic pregnancy involving the ampullary segments. This case met the findings for simultaneous tubal pregnancy by the presence of either embryos of similar age or chorionic villi in both fallopian tubes at the time of surgery [9, 10]. Ultrasonography in our case failed to make such a diagnosis and this is in agreement with other reports, i.e the use of ultrasound is not necessary to make a diagnosis in bilateral ectopic pregnancy [8, 11]. Therefore, diagnosis of ectopic pregnancy continues to be an important challenge facing emergency physicians.

Our findings in this case are similar to those of Kansaria, Chauhan and Mayadeo, who reported a right ruptured fimbrial ectopic and left chronic ruptured tubal ectopic pregnancy [12]. Surgical management to preserve the left tube was by excision of the haematoma along with a thin rim of the tube; haemostasis was achieved by under-running the salpingostomy incision. In the case we describe here, only linear salpingostomy using cautery for haemostasis was done and there was no need to suture the site of incision. In both cases right salpingectomy was performed.

Careful attention should be directed to follow-up tests. A serial measurement of serum concentrations of human chorionic gonadotrophin is necessary to rule out the risk of persistent trophoblast. Since no single postoperative concentration of human chorionic gonadotrophin is prognostic, follow-up until complete resolution is necessary [13]. Further medical treatment with methotrexate or surgery in symptomatic patients may be necessary if human chorionic gonadotrophin levels do not decline or persist.

Since the woman's future ability to reproduce may be adversely affected, we would argue the necessity of carefully examining both adnexae at the time of exploratory laparotomy undertaken for suspicion of ectopic pregnancy, as proposed by others [10,14,15].

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