University Journal of Surgery and Surgical Specialities

ISSN 2455-2860 2020, Vol. 6(1)

OVARIAN ECTOPIC PREGNANCY

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Abstract : Primary ovarian pregnancy is one of the rarest varieties of ectopic pregnancies. Patients frequently present with abdominal pain and menstrual irregularities. Intrauterine devices have evolved as probable risk factors. Preoperative diagnosis is challenging but transvaginal sonography has often been helpful. A diagnostic delay may lead to rupture, secondary implantation or operative difficulties. Therefore, awareness of this rare condition is important in reducing the associated risks.

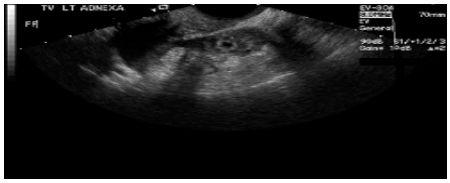
Keyword : Ovarian pregnancy, transvaginal sonography, laparotomy

INTRODUCTION:

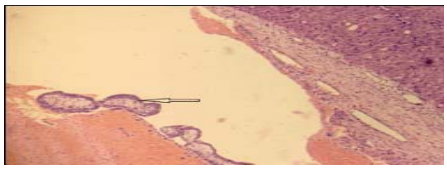
Ectopic Pregnancy is an important health problem and accounts for 10% of all maternal mortality1. (1) Primary ovarian pregnancy is even rarer accounting for 0.15–3% of all ectopic gestations2. 2) The diagnosis of an ovarian ectopic pregnancy is seldom made before surgery3. (3) Ultrasound especially transvaginal scanning (TVS) has proved to be an invaluable tool in the diagnosis of this condition4.

CASE REPORT:

A 27years old female with 53 days amenorrhoea complaints of severe abdominal pain of sudden onset over the right iliac fossa of 6 hours duration admitted on 20/05/2014. The patient was G3P1L2 A2, her first pregnancy was dichorionic diamniotic twin delivered by Lower Segment Cesarean Section. Patient underwent manual vacuum aspiration for her second pregnancy at 45 days amenorrhoea followed by copperT insertion. Copper T was removed after 3months of insertion due to heavy menstrual bleeding. The patient underwent manual vacuum aspiration for her third pregnancy at 60 days amenorrhoea followed by transabdominal tubectomy. After 7 months patient had two months amenorrhoea and her Last Menstural Period was on 28/03/14 and Urine Pregnancy Test was done on 12/05/14 found to be positive and hcG was done on 13/05/14 and it was 662.55mIU. Transvaginal Scan done on 19/05/14 showed uterus normal in size, left ovary enlarged with gestational sac 7 weeks, yolk sac seen, probe tenderness present, right ovary 4.12×2.56cm i.e, ectopic gestation left ovary. On 20/05/14 patient had abdominal pain and reached our hospital. On clinical examination she was pale; with a pulse rate of 108/minute and blood pressure of 110/70 mm Hg. The abdomen was slightly distended and both her iliac fossae were tender. The vaginal examination revealed tenderness in all the fornices. The clinical diagnosis of a possible ruptured ectopic pregnancy was made. Her urine showed positive results for pregnancy test. Routine hematological and biochemical tests were within normal limits. On laparotomy about 100ml of hemoperitoneum present. Evidence of sterilization present on both sides. Evidence of ruptured left ovarian pregnancy present. Left oopherectomy done. On microscopic examination plenty of chorionic villi lying dispersed in a background of haemorrhagic ovarian stroma were identified.



TVS-Left ovarian pregnancy



Histopathology showing chorionic villi

DISCUSSION:

Primary ovarian pregnancy is a rare entity; first case being reported by St. Maurice in 16825. The reported incidence is 0.15 –3% of all ectopic gestations3. It can be classified as primary and secondary. Primary when ovum is fertilized while still within the follicle, secondary when fertilization takes place in the tube and the conceptus is later regurgitated to be implanted in the ovarian stroma. They can be intrafollicular or extrafollicular. Intrafollicular is invariably primary and extrafollicular may be

primary or secondary where ovarian tissue is usually absent in the gestational sac. The Spiegelberg criteria6 define ovarian pregnancy which includes:

(a) intact ipsilateral tube clearly separate from the ovary
(b) gestational sac occupying the position of the ovary
(c) sac connected to the uterus by the ovarian ligament
(d) histologically proven ovarian tissue located in the sac wall.

Risk factors such as PID and prior pelvic surgery may not play a significant role in its etiology in contrast to patients with tubal pregnancies. Ovarian pregnancy is more frequent with the use of IUCD 7. The clinical diagnosis of ovarian pregnancy differs and when asymptomatic may be missed until late gestation8. The diagnosis is seldom made before surgery . Ultrasound especially TVS has proved to be an invaluable tool in the diagnosis, The diagnosis is difficult and is a continuous challenge to the gynaecologist and surgical practitioners. Ovarian rupture destroys the integrity of the organ and occasionally, that of the fallopian tube, preventing the recognition of such a gestation9. Ovarian pregnancy can be treated conservatively with single dose Methotrexate. However, the preferred mode of treatment is oophorectomy by either laparatomy or laparoscopy. In the past, ovarian pregnancy had been treated by ipsilateral oophorectomy, but the trend has since shifted towards conservative surgery such as cystectomy or wedge resection performed at either laparotomy or laparoscopy10. Currently laparoscopic surgery is the treatment of choice7. Fertility after ovarian pregnancy has been reported to be unmodified. Although ovarian pregnancy is a rare event, awareness of this condition is important in reducing the associated morbidity and mortality. Hence, it can be concluded that ovarian ectopic pregnancy should be entertained as one of the important differential diagnoses in a female of reproductive age group presenting with acute abdomen.

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