

Peforating invasive mole masquerading as an ovarian tumour – case report

* R Chandran BBS, MRCOG, MOG
Lecturer

* K.Y. Tham B.Sc., MBBS, MRCOG
Lecturer

** I. Rose MBBS, DCP
Lecturer

**Dept. of Obstetrics and Gynaecology, ** Dept. of Pathology
National University of Malaysia, Kuala Lumpur*

Summary

An invasive mole causing uterine perforation is a rare occurrence. We describe below a case with an unusual presentation which was mistaken for an ovarian tumour. The difficulty in diagnosis and the need for a high index of suspicion is highlighted.

Key words : Invasive mole, uterine perforation, misdiagnosis.

Case Report

A 55 year old Malay Para 9 whose last childbirth was 14 years ago was admitted with dull left iliac fossa of one week duration. She had always had regular periods but had been amenorrhoeic for the past 8 months. There was no per vaginal bleeding and there were no symptoms of pregnancy or menopause. Clinical examination did not reveal any pallor (haemoglobin of 11.8 gm/dl) and the cervical, supraclavicular and inguinal lymph nodes were not enlarged. There was slight tenderness in the left iliac fossa but no masses were felt and there was no ascites. Pelvic examination revealed a firm, healthy cervix and a bulky uterus with a tender, irregular left adnexal mass.

The chest X-Ray and Pap smear were normal. Ultrasonography revealed a bulky, retroverted uterus. The endometrial echo did not appear to be unusually thickened but there was an echodense left adnexal mass measuring 6 cm by 6 cm. The provisional diagnosis was a left ovarian tumour with torsion or haemorrhage.

At laparotomy, an irregular cystic tumour mass was noted to arise from the uterus and extend into the left ovary and to the left broad ligament as well. There was no ascites or haemoperitoneum. A total abdominal hysterectomy and bilateral salping-oophorectomy was performed. The cystic tumour mass extending into the left broad ligament was removed cautiously in a piece-meal fashion for fear of injuring the left ureter. haemostasis was secured with difficulty.

A longitudinal section of the enlarged uterus showed an area of cystic changes arising from the fundus. This cystic mass was noted to perforate the left lower uterine wall (Fig. 1) involve the left ovary and extend into the left broad ligament.



Fig. 1 :
Enlarged uterus with cystic changes at the fundus.
Arrow indicates site of perforation at lower left
uterine wall.

Histology confirmed this cystic mass to be molar tissue. The enlarged villi were avascular and oedematous with surrounding trophoblastic proliferation within the myometrium (Fig. 2). There was no histological evidence of choriocarcinoma. The right ovary showed a corpus luteum. The left ovary had a developing follicle and one area of this ovary showed cystic areas filled with degenerating villous structures and trophoblasts. Similar molar tissue was identified within the left broad ligament with evidence of vascular invasion.

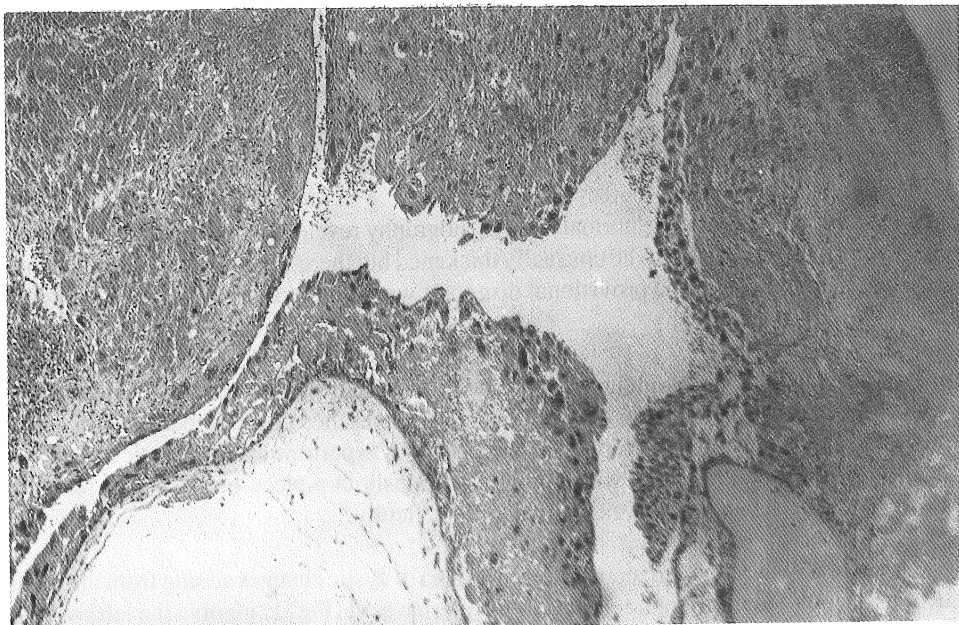


Fig. 2 : Avascular oedematous villi within the myometrium (x 80)

The serum beta-hCG on the 5th post operative day was 500 IU/L and fell to 132 IU/L 4 weeks later. Despite the decline in serum beta-hCG, it was felt that this patient would benefit from chemotherapy. She was commenced on a course of intramuscular methotrexate 10 mg daily for 10 days with intramuscular folinic acid 6 mg every other day. She completed 3 courses of chemotherapy and the progressive fall in serum beta-hCG is shown in Fig. 3. To date, the patient is well and the serum beta-hCG levels have remained within the normal range of 1 - 12 IU/L.

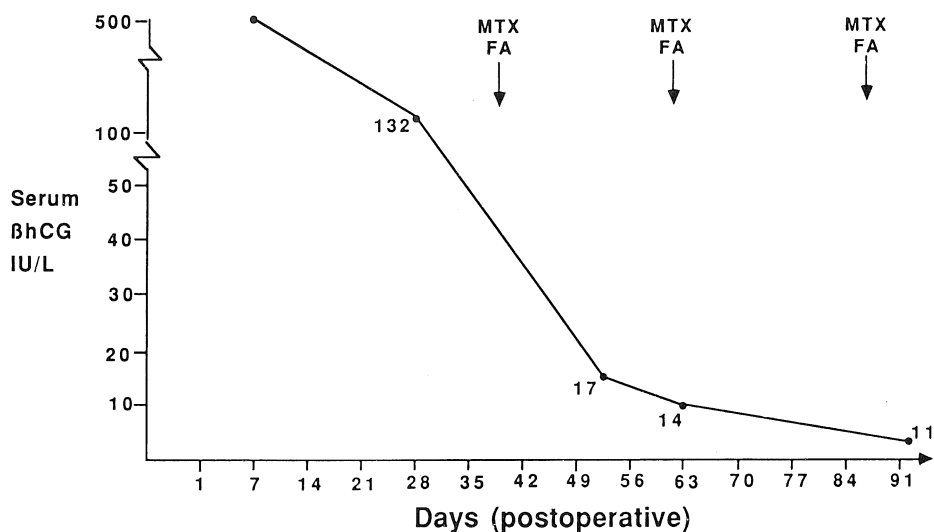


Fig. 3 : Clinical course

Discussion

In Malaysia, it is estimated that 1 : 300 pregnant women may develop a molar pregnancy¹. The exact incidence of invasive mole is difficult to assess as the diagnosis cannot be made on evacuation of the uterus alone. Despite revolutionary advances in ultrasonography, it is not always possible nor is it easy to diagnose myometrial invasion. It is possible however to image small tumour deposits in the uterine wall using a radiolabelled antibody directed against hCG.^{2,3} Molar tissue also has a characteristic appearance with magnetic resonance imaging (MRI). As the myometrium is clearly shown as a separate structure, MRI may allow for accurate assessment of myometrial invasion.⁴ In the absence of such facilities, histological examination of a hysterectomy specimen is the only definitive method of diagnosis as illustrated in this case.

An invasive mole causing uterine perforation is a rare occurrence.⁵ The unusual feature in the patient reported here is the absence of per vaginal bleeding and symptoms of pregnancy. The clinical findings were thought to be suggestive of an ovarian tumour which had undergone torsion or haemorrhage.

In view of her age, the amenorrhoea in this patient was attributed to the menopause. However, she had no menopausal symptoms and in retrospect, the amenorrhoea was probably secondary to elevated hCG levels. Histology of the ovaries in fact confirm that she is not postmenopausal.

This case also serves to illustrate that over-reliance on ultrasonography can be misleading. It is known that a retroverted uterus as in this patient may decrease echogenicity in the fundal region and hinder

adequate visualisation of the endometrial cavity. This may have been the reason why the cystic mass at the uterine fundus was not detected. Although molar tissue has a characteristic appearance on ultrasound, the echodensity of the tissue in this case was probably due to necrotic tissue and blood clots. Furthermore, the involvement of the ovary led us to believe that the lesion was primarily ovarian in origin.

Although an invasive mole is generally less malignant than choriocarcinoma, it may be associated with fatal metastases. The use of chemotherapeutic agents in invasive mole is controversial. Although the beta-hCG in this case showed a downward trend, there was some doubt as to whether all the molar tissue had been cleared from left broad ligament. There was also the fear of trophoblastic embolisation intraoperatively. On balance, we felt the patient would benefit from chemotherapy.

Gestational trophoblastic tumours should be borne in mind even in elderly women who are apparently menopausal. Although rare, they can and do occur even in menopausal women in this country.⁶ A high index of suspicion is required especially in regions such as ours where the incidence of such tumours is relatively high.

References

1. Sivanesaratnam V, Ng KH. Prophylaxis against choriocarcinoma. *Med J Malaysia* 1977; 31, 229-232.
2. Begent RHJ, Searle F, Stanway G, et al. Radioimmunolocalisation of tumours by external scintigraphy after administration of ¹³¹I antibody to human chorionic gonadotrophin. *JR Soc Med* 1980; 73, 624-630.
3. Begent RHJ, Keep PA, Green AJ. Liposomally entrapped second antibody improves tumour imaging with radio-labelled (first) antibody tumour. *Lancet* 1982; ii, 739-742.
4. Powell MC, Buckley J, Symonds EM et al. Magnetic resonance imaging and hydatidiform mole. *Brit J Radiol* 1986; 59, 561-564.
5. Goh JYL, Sivanesaratnam V, Peh, SC. Perforating invasive mole with subsequent metastases. *S'pore J Obs. Gynae.* 1987; 18 (3), 151-153.
6. Khoo KE. Choriocarcinoma - an unusual case. *Med J Malaysia* 1978; 33, 156-157.