Rare disease

Molar pregnancy in postmenopausal women: a rare phenomenon

Seema Mehrotra, Urmila Singh, Shilpi Chauhan

Department of OB&GYN, CSMMU (Formerly KGMU), Lucknow, Uttar Pradesh, India

Correspondence to Dr Seema Mehrotra, mehrotra.seema@gmail.com

Summary

Benign gestational trophoblastic disease generally occurs in women of the reproductive age group and is extremely rare in postmenopausal women. We describe a case of complete hydatidiform mole in a 60-year-old postmenopausal woman who was referred with diagnosis of suspected malignancy/myoma resulting in delay in management. This case highlights the fact that gestational trophoblastic disease can occur in menopausal woman and this should be included in the differential diagnosis of perimenopausal and postmenopausal haemorrhage to prevent delay in diagnosis and treatment.

BACKGROUND

Gestational trophoblastic tumours (GTN) are primarily diseases of women of reproductive age and although advanced maternal age is an important risk factor these tumours are exceedingly rare in postmenopausal women.

CASE PRESENTATION

The 60-year-old, G₅P₄₊₀, 2 years 6 months menopausal woman presented with swelling in the abdomen for last 5 months, bleeding per vaginum and pain in the abdomen for last 1 month.

She had four children and her last pregnancy was 14 years back. Before being referred to our hospital, she was consulting some doctor at her village who, considering her age, menopausal status, lump in abdomen and bleeding per vaginum suspected her (clinically) to be a case of myoma or uterine malignancy. No ultrasonography (USG) was done before she came to our centre. On per abdominal examination a lump of 24 weeks size gravid uterus was present. On per vaginum examination os was closed and uterus was enlarged to a size of 24 weeks pregnancy. No other abnormalities were palpated.

INVESTIGATIONS

Haemoglobin was 7 g% and the pelvic USG showed typical snow storm appearance which was suggestive of hydatidiform mole. The serum human chorionic gonadotropin (HCG) was 262 100 mIU/ml.

DIFFERENTIAL DIAGNOSIS

Pregnancy and pregnancy-related problems are rare in older women especially those who are postmenopausal. A postmenopausal woman presenting with lump in abdomen, and bleeding per vaginum usually raises suspicion of endometrial malignancy, leiomyosarcoma, oestrogen-secreting ovarian tumour. Occasionally, myoma or adenomyosis can occur in postmenopausal woman. Very rarely gestational trophoblastic disease can occur in postmenopausal woman presenting with similar symptoms.

TREATMENT

USG picture along with β -HCG report suggested the diagnosis of molar pregnancy. After arranging one unit of blood, the patient was immediately taken up for suction evacuation. Blood loss at suction was approximately 500 cc. Microscopic examination of the tissue revealed generalised hydropic villi with cisterns and trophoblast proliferation consistent with a complete hydatidiform mole. In view of the age of the patient, postmenopausal status and β -HCG >100 000, patient was subsequently taken up for total abdominal hysterectomy and bilateral salpingo-oophorectomy. Histopathology of hysterectomy specimen showed no residual disease in the uterus. Endometrial thickening was present and decidual reaction was present in the endometrium.

Follow-up showed a steady downward trend in the level, which was undetectable within 2 months.

OUTCOME AND FOLLOW-UP

The patient had an uneventful postoperative period with a negative work up for metastasis which included x-ray of chest, abdominal and pelvic ultrasound. After normalisation of her HCG (after 8 weeks), she was closely followed for a year with monthly serum HCG measurement and thereafter she was lost to follow-up. No recurrence was observed during the follow-up period.

DISCUSSION

Pregnancy is uncommon in women over 50 years of age, and when it occurs the outcome is frequently abnormal¹. Pregnancy in older age may either end in spontaneous abortion or may result in molar pregnancy.

A review of the literature showed that occurrence of gestational trophoblastic disease (GTD) in postmenopausal women is rare.^{2–4} GTD in the perimenopausal and postmenopausal age group may be benign or malignant but in the postmenopausal age group is usually malignant.^{5–6} Tsukamoto *et al*⁷ reported 20 cases of trophoblastic disease in women aged 50 or older. In total, 25%

Table 1 Five published cases of hydatidiform mole in postmenopausal woman

Serial number	Authors	Reporting year	Cases	Age (years)	Treatment	Reoccurrence
1	Jequier and Winterton ⁶	1973	2	50 54	Hysterectomy dilatation and curettage	None
2	Roy <i>et al</i> ¹⁰	2000	1	61	Hysterectomy	None
3	Garica <i>et al</i> ²	2004	1	55	Hysterectomy	None
4	Abike <i>et al</i> ⁸	2008	1	56	Hysterectomy	None
5	Malik <i>et al</i> ⁹	2009	1	52	Hysterectomy	None

patients were diagnosed with a choriocarcinoma, 35% were diagnosed with a hydatidiform mole and 40% were diagnosed with an invasive mole. However, none of the patients with hydatidiform mole were postmenopausal. In another larger series, Jequier and Winterton⁶ reviewed 109 cases of GTD in women older than 50 years. They found malignant disease in 28.4%, benign moles in 47.7% and unclear pathological diagnosis in the remaining 23.9%. There were only two postmenopausal patients who had a documented period of an amenorrhoea greater than 1 year and were diagnosed with a benign mole. To our knowledge, our case represents the sixth case in world literature^{2 6 8–10} of a complete hydatidiform mole in a postmenopausal woman with a history of more than 2 years of amenorrhoea (table 1).

Identification of GTD in women over 50 years of age is difficult as menopause is expected and the possibility of pregnancy is often overlooked or denied.¹¹ In our case, the patient being postmenopausal, the diagnosis of myoma or malignancy was made initially and the possibility of molar pregnancy was not considered resulting in delay in management of the patient. Owing to the high rate (56.3%) of malignant sequelae after molar evacuation, a primary hysterectomy for the treatment of hydatidiform mole in this age group is recommended.¹² However, there remains an 8–20% risk of postmolar GTD in elderly patients after hysterectomy and close follow-up with serum β -HCG is indicated.¹¹

The patient was amenorrhic for more than 2 years. According to the North American menopause society, menopause is clinically defined as the period that begins after the final episode of menstrual bleeding. The aging ovaries continue to produce certain amounts of oestrogen and androgens for at least 10 years after the start of menopause.¹³ At the time of menopause the number of follicles in the ovaries decrease, oestrogen production continues to fall. When a level incompatible with the induction of luteinising hormone (LH) surge is reached, ovulation may cease or frequently may become irregular. Clinically, this is associated with irregular cycles and a shortened luteal phase, or anovulatory cycles with unopposed oestrogen stimulation and endometrial hyperplasia. Anovulatory cycles may be interspersed with ovulatory cycles. A period of amenorrhoea with elevated follicle stimulating hormone and LH may mimic menopause but is followed a few months later by an ovulatory cycle and normal gonadotrophin level.¹⁴ This transitional period of progressive loss of ovarian function and sporadic ovulatory cycles explains the occurrence of molar pregnancy in a 60-year-old woman.

In conclusion, even though gestational trophoblastic disease is rare, it can occur in postmenopausal women.

Therefore, a high level of suspicion should be maintained and GTD should be included in the differential diagnosis of perimenopausal bleeding to prevent delay in diagnosis and treatment.

Learning points

- ▶ Although rare, gestational trophoblastic disease should be considered in evaluation of perimenopausal and postmenopausal vaginal bleeding.
- ▶ In menopausal women, since risk of subsequent development of choriocarcinoma is high, definitive treatment with total abdominal hysterectomy should be considered.
- ▶ Long-term follow-up with β -human chorionic gonadotropin should be carried out to detect recurrence.

Competing interests None.

Patient consent Obtained.

REFERENCES

1. Miletic T, Aberle N, Mikwandra F, *et al*. Perinatal outcome of pregnancies in women aged 40 and over. *Coll Antropol* 2002;**26**:251–8.
2. Garica M, Romaguera RL, Fernandez CG. A hydatidiform mole in a postmenopausal woman. A case report and review of literature. *Arch Pathol Lab Med* 2004;**128**:1039–42.
3. Goedhals J, Botha MC, Theron M, *et al*. Complete hydatidiform mole in a 57 year old woman. *SAJOG* 2012;**16**:22–3.
4. Lok CAR, Zurcheri AF, Velden VD. A case of hydatidiform mole in a 56 year old woman. *Int J Gynecol Cancer* 2005;**15**:163–6.
5. Yen S, Mac Mahon B. Epidemiologic features of trophoblastic disease. *Am J Obstet Gynecol* 1968;**101**:126–32.
6. Jequier A, Winterton WR. Diagnostic problems of trophoblastic disease in women aged 50 or more. *Obstet Gynecol* 1973;**42**:378–87.
7. Tsukamoto N, Iwasaka T, Kashimura Y, *et al*. Gestational trophoblastic disease in women aged 50 or more. *Gynecol Oncol* 1985;**20**:53–61.
8. Abike F, Temizkan O, Payasli A, *et al*. Postmenopausal complete hydatidiform mole. A case report. *Maturitas* 2008;**59**:95–8.
9. Malik S, Chechi K, Chauhan M, *et al*. Molar pregnancy in a 55 year old woman. *J Gynecol Surg* 2009;**25**:163–4.
10. Roy KK, Malhotra N, Takkar D, *et al*. Poststerilization molar pregnancy in a 52 year old menopausal woman. *Acta Obstet Gynecol Scand* 2000;**79**:716–17.
11. Bandy LC, Clarke-Pearson DL, Hammond CB. Malignant potential of gestational trophoblastic disease at the extremes ages of reproductive life. *Obstet Gynecol* 1984;**64**:395–9.
12. Davidson SA, Gottesfeld J, La Rosa FG. Molar pregnancy in a 60 year old woman. *Int J Gynaecol Obstet* 1997;**56**:53–6.
13. Meldrum DR, Davidson BJ, Tartaryn IV, *et al*. Changes in circulating steroids with aging in postmenopausal women. *Obstet Gynecol* 1998;**57**:624–8.
14. Copeland JC. *Textbook of gynaecology*. Philadelphia, PA: Saunders, 1993:619.

This pdf has been created automatically from the final edited text and images.

Copyright 2012 BMJ Publishing Group. All rights reserved. For permission to reuse any of this content visit <http://group.bmj.com/group/rights-licensing/permissions>.

BMJ Case Report Fellows may re-use this article for personal use and teaching without any further permission.

Please cite this article as follows (you will need to access the article online to obtain the date of publication).

Mehrotra S, Singh U, Chauhan S. Molar pregnancy in postmenopausal women: a rare phenomenon. *BMJ Case Reports* 2012;10.1136/bcr-2012-006213, Published XXX

Become a Fellow of BMJ Case Reports today and you can:

- ▶ Submit as many cases as you like
- ▶ Enjoy fast sympathetic peer review and rapid publication of accepted articles
- ▶ Access all the published articles
- ▶ Re-use any of the published material for personal use and teaching without further permission

For information on Institutional Fellowships contact consortiasales@bmjgroup.com

Visit casereports.bmj.com for more articles like this and to become a Fellow