

Pregnancy Outcome Within One Year After Molar Evacuation.

-Sajeda A. Rubaei (F.I.C.M.S) Department of Obst. And Gyna. Medical College University of Basrah Iraq.

Introduction

Hydatidiform mole pregnancy divided into two major groups, complete molar pregnancy with diploid karyotype and partial moles which is triploid karyotype⁽¹⁾. The incidence of molar pregnancy in Europe and north America 1:2000 Pregnancies which in Asia the incidence is as high as 1:200 live births⁽²⁾. Woman aged over 40 and below 20 years are particularly at risk⁽²⁾. Women with a history of one mole have a 20 folds risk of recurrence⁽³⁾, patients with molar pregnancy require careful HCG follow up after evacuation to insure complete remission because the principle risk is choriocarcinoma which occurs in 3% of the cases, the risk is low in partial moles⁽⁴⁾. Effective contraception is advised for one year after evacuation during which follow up with an HCG assay is therefore essential, the determination repeated every 1-2 weeks until the HCG disappears, then monthly for 6 months⁽⁵⁾ but unfortunately despite strong encouragement, some patients with hydatidiform mole conceive a new pregnancy before completing a recommended follow up. So our aim in this study is to determine the pregnancy outcome in patients with partial or complete molar pregnancy who conceive before completing the recommended HCG follow up.

Materials and Methods

Seventy-three patients with molar pregnancy who conceived within one year after evacuation and before completion of HCG follow up were identified in Basrah from the 1st of Jan. 1996 till the 1st of Jan 1999. After molar evacuation, patients were advised to have pregnancy test in dilution every two weeks until undetectable after 1-2 months, then monthly until remain undetectable for 6 consecutive months.

All patients achieved at least one negative pregnancy test in dilution before the onset of a new pregnancy, the patients were divided into two group a partial mole in 38 (52.1%) and a complete mole in 35 (47.9%) depending on ultrasound report or result of pathology. All patients were advised strongly to use reliable method of contraception during the follow up period. Information about age, parity, gravidity, previous obstetrical history, pathology or ultrasound of antecedent molar pregnancy, time interval from the first negative pregnancy test in dilution, time interval from the first negative pregnancy test in dilution to the last menstrual period of the new pregnancy and outcome of the new pregnancy .All patients underwent pathological examination of the products of ectopic and spontaneous abortion in the new pregnancy to exclude risk of repeat mole Statistical analysis was carried out using χ^2 test. Results were considered to be significant at $P < 0.05$.

Results

Seventy-three patients with molar pregnancy who conceived with in one year after evacuation and before completion of follow up period were studied.

Table 1. Outcome of pregnancy

Pregnancy outcome	Partial mole	Complete mole	Total (%)
- No. Of pregnancies.	38	35	73
- Lost to follow up.	6	5	11
- Eligible for outcome.	32	30	62
- Term live birth.	20(68.7)	23(76.6)	45(72.5)
- Spontaneous abortion.	6(18.7)	4(13.3)	10(16.12)
- Preterm delivery.	4(12.5)	2(6.6)	6(6.6)
- Ectopic pregnancy	0	1(3.3)	1(1.6)
- Mode of delivery			
- C.S.	4(15.3)	3(12)	7(13.7)
- NVED	20(76.9)	21(84)	41(13.7)
- Instrument	2(7.6)	1(4)	3(5.8)

Table 2. Pregnancy outcome compared with clinical variables

	Non-viable Pregnancies(11)	Viable Pregnancies(51)	Total	P.
- Age (y)				
<25	2	18	20	N.S
25-35	6	22	18	
>35	3	11	14	
- Parity				
0	2	20	22	N.S
1-4	9	31	40	
- Remission period				
0-4 wk	6	26	32	N.S
5-6 wk	4	21	25	
9-10	1	4	5	
- Interval to new pregnancy				
0-3 months	7	27	34	N.S
4-6 months	4	34	38	
Total	11(17.7)	51(82.2)	62	

From the collected data above it was found that the mean age of 38 patients with partial mole was 25.9 years (16-44) the mean gravidity was 4.1 (1-6) and mean parity was 2.3 (0-4). The mean time interval from evacuation to achievement of the first negative pregnancy test in dilution was 4.9 wks (1-10wks) and the mean interval from the first negative pregnancy test in dilution to the new pregnancy was 3.2 months (1-6). In comparison with complete mole it was found that the mean age of the 35 patients with complete mole was 27.1 years (17-44 years), the mean gravidity, parity, interval from evacuation to the achievement of the first negative test in dilution and the mean interval from the first negative pregnancy test in dilution to the new pregnancy was 3.9 (1-7), 3.1 (0-4), 6.2 weeks (1-12 weeks) and 4.3 months (1-6 months) respectively. Table No. I show that in partial mole 26 patients (81.2%) had available pregnancy outcome and 6 patients (18.7) had an early pregnancy loss and the cesarean section rate was 15.2% (4 out of 26). None of the delivered pregnancies was found to have gross congenital malformation and that none of the

patients with partial mole had a history of prior molar pregnancy. while in complete mole 25 patients (83.2%) had aviable pregnancy outcome and 5 patients (16.8%) had an early pregnancy loss, the caesarean section rate was 12% (3 out of 25), none of the patients had any fetal gross congenital malformation and only one patient has previous mole pregnancy^(2,8). An over all live birth rates of 84.8% was observed after we excluded patients lost to follow up and early pregnancy loss, and the live birth rate in partial and complete mole 81.21% and 83.2% respectively and the difference was statistically not significant. Table No. II summarized the relationship between clinical variables and outcomes by combining the data from both groups. None of the variables studied including, age, parity, remission period and interval to new pregnancy was found to have significant relationship to early pregnancy loss.

Discussion

From literature reviewed, it was found that approximately 18-29% of the patients with complete molar pregnancy develops post molar tumor compared with only 2.4% partial mole. So it is essential that pregnancy should be avoided by using a method of contraception during the follow up period in order to identify patients developing persistent tumor requiring subsequent chemotherapy⁽⁷⁾. After molar evacuation, once a patient achieves an undetectable hCG level, the risk of developing persistent gestational trophoblastic tumor is less than 1%⁽⁸⁾ and this finding was in agreement with our patients who achieved undetectable hCG level by having at least one negative pregnancy test in dilution and had a new pregnancy before completely advised follow up developed and evidence of persistent gestational trophoblastic tumor. It was found that the live birth in partial and complete mole was 82.2% and 83.2% respectively; this data does not appear to differ from the reproduction outcome of the patients with hydatidiform mole who completed hCG follow up^(5,9)

It was found that there was no association between risk of early pregnancy loss and maternal age, parity, remission period and interval to the new pregnancy and none of the live births in complete and partial mole had any gross congenital malformation.

Once undetectable hCG level are achieved, the risk of persistent tumor is low and reproduction outcome is favorable so pregnancy occurring before the completion of hCG follow up may be allowed to continue under careful surveillance. These findings strictly related to patients who achieved at least one negative pregnancy test in dilution within one year after molar evacuation and it must be acknowledged also that our study represent a small sample size and we hope that a larger sample size should be studied to confirm our findings in the future; and we hope that we may be able to get use of serum hCG level for follow up in the future in our governorate .

References

- Coldstein DP, Berkowitz, RS. Reproductive performance after molar pregnancy. Clin Obstet Gynecol 1984; 27: 221.
- Craighill MC. Epidemiological of molar pregnancy. J Report Med 1984; 29:784.
- Palmer JR. Advances in the epidemiology of gestational trophoblastic disease. J Rep Med 1994; 39: 155-162.
- Szulman AE. Syndromes of hydatidiform moles partial vs complete. J Rep Med 1984; 29: 788
- Kim JH. Subsequent reproductive experience after treatment for gestational trophoblastic disease. Gynecol Oncol 1998; 71: 108-112.
- Bagshawe KD. Hydatidiform mole in the United Kingdom 1973-1983. Lancet 1986; 2: 673-7.
- Pattillo RA. The HCG assay in the treatment of trophoblastic disease. J Report Med 1984; 29: 802.
- Twiggs LB. Nonneoplastic complications of molar pregnancy. Clin Obstet Gynaecol 1984; 27: 199.
- Berkowit RS. Gestational trophoblastic disease. Subsequent pregnancy outcome including repeat molar pregnancy. J Report Med 1998; 43: 186.