ADVANCED ABDOMINAL PREGNANCY — CRITICAL ANALYSIS OF 7 CASES MET IN RURAL OBSTETRIC PRACTICE

by

D. C. DUTTA,* M.B.B.S., D.G.O., M.O. (Cal.)

Abdominal pregnancy is one of the rare variant of ectopic pregnancy. Its rarity, varigated clinical pictures and not keeping in mind the possibility lead to confusion in diagnosis even by experienced gynaecologist. This has prompted the author to present 7 cases met in rural obstetric practice.

The cases were admitted and treated by the author while attached to the District hospitals, Jalpaiguri, Suri and Chinsurah of West Bengal, covering a period of 9 years (1965 to 1973). During this period there were 19888 births and there were 56 ectopic pregnancies giving an incidence of 1 in 355. The number of abdominal pregnancy was 7, giving an incidence of 1 in 2841, the relative distribution amongst ectopic pregnancies being 12.5%.

Case 1

Mrs. A. S. aged 20 yrs. PO + O, married for 6 years, having amenorrhoea of 9 months was admitted at Sadar Hospital, Jalpaiguri with abdominal discomfort and a discharging umbilical sinus. She had abdominal discomfort throughout pregnancy. Examination revealed pallor ++, Hb%-7 gms%, presence of an umbilical sinus through which bones were coming out and a lump was felt in lower abdomen size of 26 weeks pregnancy. On vaginal examination a normal sized uterus incorporated in the mass was felt per abdomen. A tentative diagnosis of abdominal pregnancy was made. On laparotomy foetal bones were found lying inside the collapsed gestation sac which was placenta plastered over the intestines. Marsupalisation was done. On 10th postoperative day she developed small gut fistula which healed spontaneously after one month.

Case 2

Mrs. S.G. aged 22, $P_2 + O$, last childbirth 1 year back, having amenorrhoea of 9 months, was admitted at Sadar Hospital, Jalpaiguri with features of acute abdomen and collapse. On examination patient was in shock with features of internal hemorrhage. Foetal parts were felt superficial and the F.H.S. was absent. On vaginal examination uterus was of 14 weeks size with os closed and slight bleeding. Provisional diagnosis of rupture uterus was made. Laparotomy was done. Gestation sac was found under the anterior parietal peritoneum with placenta attached to the fundus of uterus. Tubes and ovaries of both the sides were healthy. Removal of foetus and subtotal hysterectomy with attached placenta were done. Baby was male, fresh stillborn weighing 1,900 gms with telepes of both legs. Recovery was uneventful.

Case 3

Mrs. B.M. aged 27 yrs $P_2 + O$ with last childbirth 3 years back, having amenorrhoea of 9 months was admitted at Sadar Hospital, Jalpaiguri with respiratory distress. She had occasional gastro-intestinal trouble and anaemia during pregnancy and was treated with I.M. Imferon. On examination there was pallor ++ with Hb. 7 gms% and respiratory distress +. Abdominal examination showed superficial foetal parts with foetus lying transversely and absence of F.H.S. Vaginal examination was not done. Provisional diagnosis of severe anaemia with intrauterine death of foetus was made. After 48 hours internal examination was done which revealed uterus of 14 weeks size with firm tubular cervix. Laparotomy was done. Gestation sac was under the anterior parietal peri-

*Assistant Professor (Post Partum Unit), N.R.S. Medical College, Calcutta.

Accepted for publication on 15-11-1977.

toneum, the placenta was attached posteriorly. Uterus, tubes and ovaries cou d not be approached. Removal of macerated foetus and sac was done. The placenta was left behind. Baby was female, macerated, weighing 1330 gms. Two bott es of blood transfusion was given. Recovery was uneventful.

Case 4

Mrs. A. G. aged 40, $P_5 + O$ last childbirth 4 years back having amenorrhoea of 8 months was admitted at Sadar Hospital Jalpaiguri with slight bleeding with loss of foetal movements for 4 days. She had vague pain all over abdomen throughout pregnancy and had slight vaginal b eeding for the last 20 days. Examination revealed pallor ++ with Hb 8 gms%. Foetal parts were felt superficia ly with foetus presen ing by breech si uated high up F.H.S. was absent. A provisional diagnosis of anaemia with breech and intrauterine dea h of foetus was made. Diagnosis of secondary abdominal pregnancy was tentatively made af er taking two straight X Rays of abdomen at interval of 7 days showing persistant fixed position of the foetus Laparotomy showed the gestation sac under the anterior parietal peritoneum with placenta attached to the posterior surface of the uterus and broad ligament. Removal of foetus with subtotal hysterec omy along with left sa'phingo oophorectomy with attached placenta and part of gestation sac was done. Baby was female macerated weighing 1475 gms. Recovery was uneventful.

Case 5

Mrs. A.B. aged 30 years $P_1 + O$, last childbirth 13 years back having amenorrhoea of 4 months was admitted at Sadar Hospital Suri with acute pain in lower abdomen. She had vague pain in abdomen after the first missed period and thereafter. Examination revealed pallor ++, Hb%-7 gms. A tender lump was fe't in the hypogastrium, size of 18 weeks. On vaginal examination uterus was bulky and incorporated with the mass felt per abdomen and extending to the pouch of Douglas. A tentative diagnosis of disturbed ectopic pregnancy was made and laparotomy was done. The gestation sac was found occupying the pouch of Douglas with placenta attached to the omentum. Size of foetus 5", was lying freely in abdominal cavity through a rent in the sac. Removal of foetus and the gestation sac was done. The placenta was removed along with omentum. Recovery was uneventful.

Case 6

Mrs. M.M. aged 17 years $P_6 + O$ married for 1 year, having amenorrhoea of 7 months was admitted at Sadar Hospital Suri with respiratory distress and abdominal distension. She had occasional abdominal discomfort during pregnancy. Examination revealed pallor ++, Hb 8 gms% with features of respiratory distress. Abdominal swelling was of 32 weeks pregnant size with foetus presenting by breech situated high up. F.H.S. was absent. Vaginal examination was not done. A provisional diagnosis of anaemia with dead foetus in breech position was made. Straight X-Ray abdomen showed breech situated high up with evidences of I.U.D. Vaginal examination was done on 12th day which revealed uterus of 12 weeks and cervix firm. Confirmation of secondary abdominal pregnancy was done by sound test. On laparotomy the gestation sac was found under the anterior parietal peritoneum with the placenta attached posteriorly over the pulsatile aorta and inferior vena cava. Uterus, tubes and ovaries cou'd not be reached. Removal of mummified foetus and part of sac was done. Placenta was left behind. There was recurrent parietal fistula in post operative period which required exploration and removal of few bones left behind. Thereafter there was uneventful recovery.

Case 7

Mrs. R.B. aged 20 years $P_2 + O$, last childbirth 2 years back having amenorrhoea of 8 months was admitted at Sadar Hospital, Suri with dull pain in abdomen with loss of foetal movement along with slight vaginal b eeding. Examination revealed pallor +, Hb 9 gms%. Abdominal Swelling was of 32 weeks size with foetus presenting as breech situated high up F.H.S. was absent. Vaginal examination was not done. A provisional diagnosis of anaemia with breech and intrauterine death of foetus. was made. Vaginal examination was done on 7th day which revealed the uterus of 12 weeks size with cervix tubular and firm. On laparotomy the gestation sac was found under the anterior parietal peritoneum with placenta attached to the anterolateral aspect of the sac.

Uterus tubes and ovaries could not be visualised. Removal of the foetus, part of the gestation sac and the placenta was done. Foetus was male, macerated weighing 1140 gms. Recovery was uneventful.

Discussion with Comments

Advanced abdominal pregnancy is a rare condition. The frequency met in the series while consistent with that mentioned by Beachan *et al* (1962), 1 in 3373 or by Crawford and Ward (1957), 1 in 3161 but at varience with a low figure quoted by Khanam, *et al* (1976) being 1 in 21600 deliveries. The relative distribution of abdominal pregnancy amongst ectopic one in present series (12.5%) is comparatively high when compared with that of Jacob and Bhargava (1969) being only 1.5%.

Abdominal pregnancy is almost always secondary, the primary site of implantation being fallopian tube. The perforating villi with intact sac either herniates out through a rent in the tube or rarely by tubal abortion. While tubes could not be explored in every cases because of adhesions except in case 2 where the tubes were found healthy, the latter method of escape could not be ruled out. A similar case was met by Mukherjee (1976). In any case as the process is a slow one acute symptoms are not expected and in fact only 1 case in the present series (Case 5) could narrate vague pain after the first missed period.

Because of displacement of the intestines by the gestation sac and increasing foetal movements, the mother experiences more discomfort during pregnancy. In fact in 5 out of 7 cases there were sufficient discomforts pointing towards some abnormality in pregnancy.

In acute catastrophic condition either due to separation of vascular placenta or due to rupture of the sac, the diagnosis is confused either with rupture of uterus in advanced cases or with disturbed tubal pregnancy in early period of gestation. Patients presenting vague symptoms give diagnost c problem if the condition is not kept in mind. Superficial foetal parts, absence of Braxton Hick's contraction, persistent abnormal high position of the foetus with or without F.H.S. and a separate uterine swelling sufficiently warrant diagnosis of abdominal pregnancy. Persistant fixed position of the foetal shadow and superimposition of foetal shadow with spinal shadow on lateral view X-Ray are very much supportive while passing an uterine sound into the uterine cavity which is smaller and out of proportion to the period of gestation is conclusive.

In the present series, foetal bones coming out through the umbilical sinus (Case 1) gave the correct clue in the diagnosis. Case 2 was confused with rupture uterus and case 5 with old disturbed tubal pregnancy. In the rest (Case 3, 4, 6 and 7), the patients presented a picture of severe anaemia with distress and loss of foetal movement for variable period of time. As already pointed out, the diagnosis could have been possible in all the cases on admission if the possibility of abdominal pregnancy was kept in mind. But with varying delay, the diagnosis was made clinically (Case 3), supplimented by radiology (Cases 4 and 6) and confirmed by passing an uterine sound in addition (Case 6).

Once the diagnosis is made the opinion is almost crystalised in favour of laparotomy. Except in exceptional circumstances it is indeed risky to continue pregnancy hoping a living baby. Risks of catastrophic haemorrhage, foetal death or its malformation are great. Severe internal haemorrhage occurred as early as 16th week (Case 5) and as late as 36

weeks (Case 2) in the present series. Foetal death occurred in all the cases and talepes of both legs was encountered in 1 foetus out of 4 intact foetuses found in the series.

The operation consists of removal of foetus and gestation sac as far as possible. The placenta is better not disturbed if it is attached to vital/non-removal structure as catastrophic haemorrhage may occur during separation specially if it remains vascular. It was removed in 4 cases (Case 2, 4, 5 and 7) and was left behind in Case 1, 3 and 6 with uneventful recovery. Hysterectomy was done in 2 cases (Case 2 and 4) where the placenta was attached to the Uterus. One should resist temptation to separate the sac from the adjacent coils of intestine and be careful while removing the pieces of bones found in the old gestation sac.

Summary and Conclusions

Seven cases of abdominal pregnancy have been presented. The incidence was 1 in 2841 births. The varigated clinical pictures and the diagnostic pitfalls are discussed. The importance of urgent laparotomy once the diagnosis is made is highlighted. The importance of leaving behind the placenta if it is attached to vital structure is emphasised without any untoward effects.

Acknowledgement

I am grateful to the D. M. O. Sadar Hospital, Jalpaiguri, Suri and Chinsurah for kindly allowing me to utilise the hospital records.

References

1. Beachan, W. B., Hernquist, W. C., Beachan, D. W. and Webster, H. D.: Am. J. Obst. & Gynec. 84: 1257, 1962.
2. Crawford, J. D. and Ward, J. V.: Obst. & Gynec. 10: 549, 1957.
3. Jacob, S. I. and Bhargava, H.: J. Obst. & Gynec. India. 19: 646, 1969.
4. Khanam, W. and Shah, A.: J. Obst. & Gynec. India. 26: 771, 1976.
5. Mukherjee, S.: J. Obst. & Gynec. India. 26: 323, 1976.