

ULTRASOUND EVALUATION OF FIRST TRIMESTER BLEEDING PER VAGINUM

By

JAIDEEP MALHOTRA, K. SAXENA AND .N MALHOTRA

SUMMARY

Ultrasound evaluation of bleeding in first trimester pregnancy has proved very useful. It helped to assess the cause of bleeding and the progress of each pregnancy and the out-come. In our small series it has a 32% edge over the clinical diagnosis.

Introduction

Ultrasound leads to a correct diagnosis in the first trimester in majority of the cases. Ultrasound is safe, non-invasive, easy, quick and inexpensive in the long run.

The causes of bleeding in the first trimester can be summarised as:

1. Abortions — Threatened
— inevitable
— incomplete
— missed
2. Vesicular Mole
3. Ectopic Pregnancy
4. Unknown.

Material and Methods

A prospective evaluation of 150 cases reporting with bleeding during first trimester pregnancy was carried out in the Department of Obstet. and Gynaec., J.N. Medical College, A.M.U., Aligarh.

Siemen's Imager 2380, real time gray scale ultrasound was used for the purpose.

From: Department of Obstetrics & Gynaecology, J. N. Medical College, A.M.U., Aligarh.
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Permanent records were taken on multi-format where interesting findings were encountered.

Full bladder technique was used.

Observations and Results

TABLE I
Distribution According to Clinical Diagnosis

S. No.	Clinical Diagnosis	No. of Cases
1.	Threatened abortion	105
2.	Missed abortion	18
3.	Incomplete abortion	21
4.	Vesicular mole	2
5.	Ectopic pregnancy	2
6.	Pregnancy with Cu-T	2
Total		150

Ultrasound Scan Results

Threatened Abortion: It was observed that in 105 cases of threatened abortion the fetal heart activity was present in 68 cases and absent in 37 cases.

Out of the 68 cases showing positive cardiac activity the implantation was high in 52 cases and in the lower segment in 16 cases. On further follow up it was seen

that 5 out of the 52 implanted high aborted and 47 continued well into the second trimester. While out of the 16 implanted low, 5 aborted and 11 continued into the second trimester as can be seen in Table II.

It was also observed that out of the 37 cases showing no cardiac activity, 21 were therapeutically evacuated, 8 aborted spontaneously, 6 were found to be not pregnant and 2 were lost for follow up (Table II).

Vesicular Mole: Out of the 2 cases with uterus size more than gestation, twin pregnancy was detected in one while one showed the characteristic snow storm appearance of vesicular mole. (Fig. 5).

Ectopic Pregnancy: Out of the 2 suspected cases of ectopic pregnancy in one case normal intrauterine pregnancy was demonstrated while the other showed an adnexal mass with normal uterus which

TABLE II
Threatened Abortion—Sonographic Findings

Cardiac Activity	No.	Implantation	No.	Follow up
F. Heart +ve	68	High	52	—Aborted (5)
		Low (Fig. 1)		—Preg. continued (47)
F. Heart —ve	37	Evacuated	16	—Aborted (5)
		—Spontaneous		—Preg. continued (11)
		AB. (Fig. 2)		21
		—Not Pregnant		8
		—Lost for Follow up		6
				2

Missed Abortion: Out of the 18 cases diagnosed clinically 14 were confirmed by ultrasound while in 4 cases live pregnancy was demonstrated. (Fig. 3).

Incomplete Abortion: Out of the 21 clinically diagnosed cases, dead products of conception was seen in 17 cases. In 3 cases the uterus was empty and in 1 case fibroid uterus was detected. (Fig. 4).

on laparotomy turned out to be organised ectopic pregnancy. (Fig. 6)

Pregnancy with Cu-T: Out of the 2 cases 1 was found to be not pregnant while the other showed a 8 weeks pregnancy with Cu-T in situ.

Diagnostic value of ultrasound: A 32% disparity was found in between clinical and ultrasonographic diagnosis as shown in Table III.

TABLE III
Diagnostic Value
Correlation of Clinical & Sonographic Diagnosis

Clinical		Sonographic Confirmed	Disparity
Threatened AB.	105	68	37 Dead POC
Missed AB.	18	14	4 N.P.
Incomplete AB.	21	17	4 Complete
V. Mole	2	1	1 Twins
Ectopic Preg.	2	1	1 N.P.
Preg. cuT	2	1	1 Not Preg.
Total	150	102	48
% of disparity	32%		

Conclusion

Ultrasonar is the only imaging modality, today, by which an accurate assessment of first trimester bleeding can be done from Diagnostic and Prognostic point of view. In our study it helped in establishing correct diagnosis in 32% of clinically misdiagnosed cases apart from confirming the diagnosis in the rest.

"Nothing is better than the 2 fingers of an obstetrician, but ultrasonar has a defi-

nite edge over it in the first trimester".

ULTRASOUND TODAY IS A BOON TO OBSTETRICS.

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See figs on Art Paper II & III