PREGNANCY OCCURING AFTER SUCCESSFUL URETERO-NEO-CYSTOSTOMY

(A Case Report)

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Uretero vaginal fistula as such is one of the rare varieties of genito-urinary fistulae. We have not come across any case of pregnancy occurring after uretero-neo-cystostomy in literature thus necessitating its placing on record.

Case Report

Mrs N. D. 38 yrs old was admitted in antenatal ward of L.N.J.P. Hospital on 19th January 1978, from antenatal clinic for approximately 38 'weeks' pregnancy with transverse lie with history of previous lower segment caesarean section.

Menstrual history-Regular 3-5/26-28 L.M.P. About 38 weeks back.

Obstetric History G5 P4 + 0

(1) First was a full term intra-uterine death, home delivery, cause not known, 8 yrs back.

(2) Second was full term normal vaginal delivery in hospital. Female child alive and healthy, 6 yrs old.

(3) Third was full term normal vaginal delivery in the hospital, female child alive and healthy 4½ yrs old.

(4) Fourth was lower segment caesarean section done for deep transvers arrest, for failure of manual rotation and forceps application done on 14-4-76, in this hospital. Lower segment was stretched. During operation on left side, the tear extended and there was profuse bleeding which was controlled by few interrupted sutures. Female child needed resuscitation. The mother had high fever with chills and rigors for nearly ten days postoperatively. On seventeenth post operative day, she developed uretero vaginal fistula.

Patient was investigated in detail for renal function. Uretero-vaginal fistula was repaired after 6 weeks by ureteroneo-cystostomy technique.

Post operative period was uneventful. She was discharged on fifteenth day. All her repeat kidney function tests were within normal limits at the time of discharge. She was advised conventional contraceptives.

She did not come for check up.

History of present illness

She came for check up almost a year later when she was 16-18 weeks pregnant. All kidney function tests were done and the results were within normal limit. She was coming for regular ante-natal check up. From 28 weeks onward the foetus was lying transversly, till the date of admission. She was advised admission at every visit, but she refused.

On examination, general condition fair. Pallor + Oedema nil, Pulse 90/m. B.P. 110/70 mm. Hg. Heart & lungs, N.A.D.

Two healthy abdominal scars were present one right paramedian (caesarean scar) and other in left lumbar region (previous uretero-

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neocystostomy scar). Fundal height was 34 weeks, lie was transverse, vertex was in right hypochondrium and foetal heart was good.

She was kept for elective caesarean section. A week after the admission in the evening she complained of labour pains and frank leaking. She was immediately transferred to labour room. Per abdominal examination: fundal height 34-36 weeks, oblique lie, breech was in left iliac fossa. There was abulge in the lower abdomen, scar tenderness was present. Foetal heart rate was 138/min and regular. She was having good uterine contractions. Per vaginum examination cervix was fully effaced, 6-7 cms dilated, membrances were absent. One foot was felt through the cervix. Immediately she was prepared for caesarean section.

Keeping in view her obstetric history and previous uretero-neo-cystostomy classical caesarean section was decided upon. Right paramedian incision was given 2″ above the umbilicus and 3″ below the umbilicus.

Findings on opening the abdomen:

(i) Omental adhesions were present on the previous caesarean scar line.

(ii) Uterus was markedly dextro-rotated.

(iii) Lower segment could not be visualised because of marked adhesions.

(iv) In left iliac fossa adhesions were present between parietal peritoneum and omentum.

Classical caesarean section was done. Baby delivered by vertex. Female child cried immediately after birth. Placenta and membrances were removed. Uterus stiched in layers. Tubal ligation was done by Pomeroy's technique. Post operative period was uneventful.

Investigations

			Ante-natal Period	Post Operative
Hb%			9 gm%	9 gm%
Blood group Rh			'O' Rh + ive	
Blood urea			28 mg%	25 mg%
Serum Electrolyte			Na 112 mg%	Na 110 mg%
			K 3.2 mg%	K 3 mg%
Serum Creatinine			1.0 mg%	1.1 mg%
Serum Uric acid			4.5 mg%	3 mg%
Urine	(i)	Albumin	nil	nill
		Sugar	nil	nil
	(ii)	Microscopic — high power field	5-8 puscells/ not cultured	few puscells
	(iii)	Culture and sensitivity		sterile

Discussion

Uretero-vaginal fistula can occur either during obstetric-operations such as lower segment or caesarian section hysterectomy for rupture uterus or PPH, or during gynaec surgery. The incidence varies from place to place. Bhaskar Rao (1975) has reported the incidence as 1.7%. The ureteric injuries can be recognised on the table or later on when a fistula results within one to three weeks.

Diagnosis of ureteric fistula is not difficult. It is confirmed by methelene blue test and intravenous pyelography. Various types of operations are devised for ureteric fistula depending upon the site of injury. When terminal part of the ureter i.e. in the region of ureteric canal about 1 cm to 1.5 cm from the uretero-vesical junction is involved the operation of choice is uretero-neo-cystostomy. The success of operation depends on selection of cases and absence of tension on the sutureline. In this operation anatomy of ureter is restored to normal.

To the best of our knowledge pregnancy occurring after successful uretero-neo-cystostomy has not been reported before. From this case one can infer that after

successful uretero-neo-cystostomy not only function of urinary system is restored to normal but the system is also able to bear the stress of various structural and hormonal changes during pregnancy.

Management

Regarding the pregnancy occurring after uretero-neo-cystostomy.

Renal function should be done atleast once during each trimester. Urine should be tested routinely for pus cells and should be cultured during each trimester, even if there is no evidence of pus cells. Patient should be called for frequent ante-natal check up, atleast every fortnight and should be admitted two weeks before the expected date. Elective caesarian section should be done. Classical caesarian section has a definite place in previous uretero-neo-cystostomy as site of new implantation in the bladder is not exactly known and during reflection of bladder in lower segment caesarian section repaired area can be damaged again. One can emphasise that uretero-neo-cystostomy is one of the indication for classical caesarian section. Bilateral tubal ligation should also be done during caesarian section. In the post operative phase, urine examination and culture and complete renal function tests should be repeated. Post operative period should be covered with prophylactic antibiotics.

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