Case Report

Successful outcome of pregnancy in bicornuate uterus: a case report

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ABSTRACT

Bicornuate uterus is a major cause of spontaneous abortion. The recurrent pregnancy loss has been reported to the range of 15% to 27%. There is different type of congenital uterine abnormalities like Bicornuate uterus, septate uterus, arcuate uterus, unicornuate uterus, didelphys uterus. It is important to consider this diagnosis in recurrent miscarriages, malpresentation, intra uterine growth restriction and preterm deliveries. This report is about self at the age of 25-year-old pregnancy with a history of missed abortion. I was not diagnosing with a bicornuate uterus in my first pregnancy. However, I was diagnosed with a bicornuate uterus based on transvaginal ultrasound and hysterosalpingogram. A successful caesarean section was donein the 38th week of gestation. According to the results, successful outcome could be achieved with bicornuate uterus. The outcome of bicornuate uterus was successful.

Keywords: Bicornuate uterus, Hysterosalpingogram, Outcome, Pregnancy, Self, Uterine malformation

INTRODUCTION

Congenital uterine deformities resulting from fusion of the mullerian ducts and abnormal formation. These abnormalities have been related with raised rate of failure miscarriage, premature delivery and aversive fetal consequence.1

Reproductive capabilities of women can also affect by Bicornuate uterus. In the general population, uterine malformations are estimated 3% to 5%.2

Congenital malformation of uterus is one of the major cause of recurrent pregnancy loss and in patients it has been reported to range of 15% to 27%.3 Precise diagnostic test may be required to diagnose bicornuate uterus:

- Pelvic examination
- Hysterosalpingogram
- X-ray of the womb and fallopian tubes
- Transvaginal ultrasound
- Magnetic resonance imaging.

For a woman with repeated pregnancy losses, surgical intervention may be the only option available i.e. laparoscopic metroplasty, which results in a good unified uterine cavity and minimal adhesion formation.4 Therefore, a case of successful pregnancy outcome in a patient with bicornuate uterus is discussed in this report. The outcome can be improved through early diagnosis and close follow-up with proper treatment.

CASE REPORT

I was 25-year-old with previous history of missed abortion in the 7 week +2 days of gestation. No abnormal uterine abnormalities were reported by abdominal ultrasound in the first pregnancy. I attained menarche at the age of 14 year and menstrual history was not uneventful. I had no significant history of Rh incompatibility, diabetes mellitus, hypertension and any other type of rubella infection. No history of consanguineous marriage of parents. No family history of any abnormal pregnancies. After abortion of one year, I was anxious to conceive and came to GEM clinical

nursing home Jaipur, Rajasthan. I was advised for routine investigation and transvaginal ultrasound. All blood tests were normal including thyroid profile, but transvaginal ultrasound report showed that (Table 1).

**Table 1: Finding of transvaginal ultrasound report showing free fluid in uterus.**

<table>
<thead>
<tr>
<th>Bi-cornuate uterus</th>
<th>Findings</th>
</tr>
</thead>
<tbody>
<tr>
<td>Uterus</td>
<td>Transverse 51mm</td>
</tr>
<tr>
<td></td>
<td>APD 36mm</td>
</tr>
<tr>
<td></td>
<td>Long axis 71mm</td>
</tr>
<tr>
<td>No mass or gestational sac was seen in uterus; Free fluid was seen in uterus</td>
<td></td>
</tr>
<tr>
<td>Endometrium (ET)</td>
<td>8mm</td>
</tr>
<tr>
<td>RT ovary</td>
<td>30*24mm</td>
</tr>
<tr>
<td>LT ovary</td>
<td>30*20mm</td>
</tr>
</tbody>
</table>

It was also effective for me and finally, metroplasty surgery was done under spinal anaesthesia. Three months after metroplasty again hysterosalpingogram was repeated. The report showed that (Figure 2).

So, the result was pelvic inflammatory disease, with bi-cornuate uterus and doctor prescribed capsule Doxy OD for 20 days. After completion of medical treatment, again doctor advised me about hysterosalpingogram. I underwent hysterosalpingogram and report showed that (Figure 1).

- Bicornuate uterus
- Patent left fallopian tube
- Partially blocked right fallopian tube with tubal adhesion.

I was advised by Doctor to undergo Metroplasty surgery (unification) with following medications.

1. Cap. Estrafer XT 100 for 30 day
2. Inj. Placentrax 15 for alternate day.

A study showed significant and persistent improvement of signs and symptoms of PID in women who received injection placentrax because it reduced the symptoms and signs of pelvic inflammatory disease such as abdominal pain, dysmenorrhoea and adnexal tenderness.5

Another study also shows that placentrax helps in specially to reduce the risk of tubal damage, infertility and formation of adnexal mass.6

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Figure 1: Hysterosalpingogram showing bicornuate uterus, patent left fallopian tube, partially blocked right fallopian tube with tubal adhesion.

Figure 2: Hysterosalpingogram showing after metroplasty Bicornuate uterus with irregular left cornu, Bilateral patent fallopian tubes with right sided fimbrial adhesions.

Figure 3: Abdominal ultrasound showing single viable foetus appox 16.2wks with anterior, low lying placenta.

After six months of metroplasty I conceived. The abdominal ultrasounds done in the 16weeks + 2days of pregnancy confirmed the diagnosis and did not show any abnormality related to the foetus but placenta was anterior, low lying reaching the OS. So doctor advised me for review after 2-3weeks for placenta and anomalies (Figure 3).
The abdominal ultrasound was done again 20 weeks after 6 days. In this report the placenta was in anterior upper segment (Figure 4).

But when foetus was growing, I felt too much back pain and discomfort then doctor advised me some complimentary therapies and effective measures such as back massage, change of position, deep breath exercise etc. They were helpful in reducing pain and discomfort. Some study also showed that complimentary therapies and effective support measures are helpful in reducing pain and discomfort.7,8 I came in the 38 weeks of gestation to the GEM clinical nursing home without complaining of abdominal pain. I was not in labour and an ultrasound was repeated which showed breech presentation of foetus with estimated weight of 3290 grams. No gross fetal anomalies were seen. Placenta was lying in the anterior wall. Amniotic fluid was also adequate. I was scheduled for elective caesarean section. A healthy male baby was delivered by lower segment caesarean section under spinal anaesthesia. The baby weight was 3300 grams with no congenital anomaly. Apgar score of 1 minute and 5 minute was 8 and 10 respectively and breast feeding was successful. Apgar score of 1-minute and 5-minute was 8 and 10 respectively and breast feeding was successful.

**Psychological aspects**

I was so anxious to get conceive since one year after my first abortion. Then I came to know that I had bicornuate uterus with pelvic inflammatory disease. Patent left fallopian tube and partially blocked right fallopian tube with tubal adhesion and my anxiety was turned to double. Its impact was clearly visible on my personal and professional life and family member as well. Then I decided to go ahead with all coming issues regarding bicornuate uterus. Finally, my earlier anxiety turned with the grace of God and constant support of family members and team of health care personnel’s.

**DISCUSSION**

Congenital uterine malformations are asymptomatic and relatively common. Women with uterine anomalies have lower pregnancy rates and lesser reproductive outcomes compared with women who have normal uterus. Early ultrasound is a contributing method for evaluation of the effects of abnormal uterus on pregnancy.11 In my case ultrasound could not identify the bicornuate uterus in my first pregnancy and hysterosalpingogram helped out me to diagnose to bicornuate uterus. After six month of unification I conceived and at the 38 weeks of gestation I was scheduled for caesarean section due to the breech position of the fetus. I delivered a healthy boy, weighing 3300 gm. I was stable after the caesarean section and discharged in overall healthy conditions after 5 days according to policy of hospital. So it was a successful outcome of bicornuate uterus. A bicornuate uterus does not always lead to complications and may carry a pregnancy to term. Women with bicornuate uterus might experience successful pregnancy. However, it seems essential to increase the patients’ awareness towards the possible outcomes of bicornuate uterus by obstetricians. It is important to start a prenatal diagnosis to ensure proper care and prevent complications.5

**CONCLUSION**

Bicornuate uterus has an irregular shape of the uterus, which affect childbirth. It also increases the risk of miscarriage in the later stages of pregnancy, early delivery of baby due to irregular contraction of uterus or reduced uterus capacity also caused by unequal uterine shape. Bicornuate uterus is requiring extra monitoring because it is considering in high risk pregnancy. This condition is always associated with increase rate of miscarriage. So antenatal check-up is essential in order to ensure appropriate management. It should be diagnosed before occurring of pregnancy. It will be beneficial for mother as well as baby also. If bicornuate uterus is diagnosed, to ensure proper care and prevent complications through the counselling of women about its prognosis, outcomes of pregnancy and management (evidence based).

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**REFERENCES**
