

## **LOCKED TWINS: A CASE REPORT**

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### **ABSTRACT:**

Locked twins is a potentially hazardous complication of twin delivery. Herein, we report the case of a multigravida who presented in labour room with the locked twins in the late second stage of labour. There was arrest of the aftercoming head of the leading fetus. The second fetus was alive, which was delivered after abdominal disimpaction by the Caesarean Section and the first twin was pushed down to be delivered as vaginally.

**Key Words:** Locked Twins, Caesarean Section, Perinatal Mortality

### **INTRODUCTION**

Locked twins is a form of malpresentation in which a breech twin and a vertex twin become locked at the chin during attempted vaginal delivery. It is fortunately rare. It occurs in 1: 1000 twin deliveries and 1: 90 000 deliveries overall. Since it is a rare condition, even a busy obstetrician may not encounter even a single case of locked twins during his/ her entire career. Here we report a case of multigravida who presented in our labour room with locked twins, which were delivered by both abdominal and vaginal routes.

### **CASE REPORT**

An unbooked multigravida with two living children was referred from some district hospital to our tertiary care centre. She presented in labour room six hours after onset of her labour. She was not sure of her last menstrual period but was of the opinion of having nine months multiple pregnancy. On examination, her vitals were normal but she looked exhausted and dehydrated. Per abdominal examination revealed fundal height of 34 weeks and no fetal heart sound audible. The uterus was tonically contracted and the urinary bladder was grossly distended. Below downwards, the body of first twin was hanging down with the arrest of the aftercoming head. There were no

cord pulsations of this fetus. Vaginal examination revealed that the vertex of the second twin was lying down and the head of the first twin was lying high up the symphysis pubis and was hindered by the head of the first twin to be delivered vaginally. Ultrasonography was done and the diagnosis of locked twins was confirmed. Ultrasonography astonished us with the fact that the second twin had cardiac activity, though the rate was 108 beats per minute. The locking was tight enough to be disimpacted vaginally and emergency Caesarean section was planned in the interest of the second twin. Patient was catheterized for urine but there was no urine output due to obstruction. The section was performed by the senior obstetrician available at that time. There was grade IV meconium per operatively. The heads were disengaged and twin 2 delivered abdominally and handed over to the Paediatrician. The head of the first twin was pushed down to be delivered vaginally. That was monochorionic and monoamniotic multiple gestation. Both fetuses had birth weight of 2.5 kilograms each. The alive fetus remained under observation in neonatology unit and was discharged as healthy after 7 days.

The mother had an uneventful post-operative recovery and was subsequently discharged with retained Foleys catheter. She was seen again after 15 days in the follow up clinic. The abdominal wound had healed and uterus was in the involuting phase.

## DISCUSSION

Locked twins is rare complication of twin delivery. It is of two types: breech/ vertex and vertex/ vertex. The breech/ vertex is more common while in uterus or in birth canal, preventing vaginal delivery. The large sized fetuses lock above the level of the pelvic inlet while the small sized fetuses get locked in the birth canal.

Predisposing factors include uterine hypertonicity, small fetal size, reduced levels of amniotic fluid after rupture of membranes. It is more common in females with large pelvises, young primigravidae and monoamniotic twins. In our case, the patient was multigravida with hypertonic uterus, average pelvis and monoamniotic twins. The fetuses were also of average weight.

Ultrasonography at term showing twin pregnancy with first as breech and second as vertex, raises a high index of suspicion of expected locked twins. Elective Caesarean Section in such cases seems to be a wise decision, though an uneventful vaginal delivery has been achieved in many such cases (1) (2). If the patient presents in late second stage of labour, uterine relaxants can be used with the aim of disimpaction tried vaginally followed by the vaginal delivery of both fetuses (3). If it fails or the second twin is alive, emergency Caesarean Section is the only resort available. Alternatively, Zavanelli maneuver followed by abdominal delivery remains an option too. Although the destructive procedures like decapitation and craniotomy do not seem to be aesthetically acceptable, this is sometimes the only option left to salvage the alive second twin. The prognosis for fetus in locked twins is usually hazardous with high perinatal mortality and morbidity.

The first twin is higher risk as compared to the second one. Thus locked twins is considered to be a potentially alarming emergency, which most of the obstetricians have never come across due to its rarity.

A pre-decided management plan cannot be implemented in case of locked twins. It depends on stage of labour as well as condition of fetus. The maternal prognosis is usually good as compared to locked twins who are in potentially catastrophic condition.

## CONCLUSION

The management of locked twins needs to be individualized. Fetal morbidity and mortality can be avoided by identifying the potential cases, regular antenatal follow up, radiological diagnosis and timely admission and management. Our case was unfortunate to be unbooked and presenting late in the second stage of labour. However she was fortunate enough to take home at least one alive baby.

## REFERENCES

- 1) Bischopp CNS, Vogelvang TE, May AM, et al. Mode of delivery in non-cephalic presenting twins a systematic review. Arch Gynecol Obstet 2012;286:237-47. <http://dx.doi.org/10.1007/s00404-012-2294-6>
- 2). SentiihesS, Goffinet F, Talbot A, et al. Attempted vaginal versus planned cesarean delivery in 195 breech first twin pregnancy. Acta Obstet Gynecol Scand 2007;86:55-60. <http://dx.doi.org/10.1080/00016340601089594>
- 3) Sevitz H, Merrell DA. The use of a betasympathomimetic drug in locked twins. Case report. Br J Obstet Gynaecol 2005;88:76-7. <http://dx.doi.org/10.1111/j.1471-0528.1981.tb00942.x>