

Fetus Papyraceous in Twin Pregnancy: Incidental Finding during Caesarean Section

Susmita Senapati¹, Shashi Shankar Behera², Lopamudra Nayak¹, Prafulla Kumar Chinara³

¹Tutor, Department of Anatomy, IMS & SUM Hospital, Bhubaneswar, Odisha, India, ²Associate Professor, Department of *Obstetrics* and *Gynaecology*, KIMS, KIIT, Patia, Odisha, India, ³Professor, Department of Anatomy, IMS & SUM Hospital, Bhubaneswar, Odisha, India

Abstract

Fetus papyraceous (FP) is a rare clinical condition. It is the compressed, mummified, parchment like remains of one fetus of multiple pregnancy which is retained in uterus after demise in second trimester. The incidence is 1 in 17,000-20,000. In twin pregnancy, the incidence of FP is around 1 in 184 to 1 in 200 twin pregnancies. In this particular case the subject is from a rural place having no proper ante natal checkup during her pregnancy. She had a scan in third trimester of pregnancy in which no abnormality was detected and FP found incidentally during caesarean section without any adverse outcome to the mother and living fetus.

Key words: Caesarean section, Fetal death, Fetus papyraceous, Labor, Multiple pregnancy, Ultrasonography

INTRODUCTION

Fetus papyraceous (FP) is defined as a compressed fetus, the mummified parchment-like remains of a dead fetus that died in second trimester^{1,2} but the other fetus continues to grow. The amniotic fluid and placental tissue are absorbed, and the fetus compressed between the membranes of living twin. The incidence is around 1 in 184 to 1 in 200 twin pregnancies.^{2,3}

CASE REPORT

A 24-year-old primigravida admitted to my hospital with watery discharge p/v for 2 days. The patient was from a rural place around 100 km from Bhubaneswar. She had irregular ante natal checkup at the local primary health center with proper immunization. She had a sonography at 33 weeks of gestation at a local clinic which revealed no abnormality.

On examination, the vitals were stable. The uterus was term size with longitudinal lie and vertex presentation having regular fetal heart rate. Per vaginal examination revealed short cervix and os admitting the tip of finger.

With above findings a decision for induction of labor was made. An oxytocin drip along with antibiotics started. After 10 h of oxytocin drip there was non-progress of labor and a caesarean section was planned.

She underwent a caesarean section under spinal anesthesia after 12 h of admission. The surgery went uneventful resulting term healthy female child of 2750 g with 1-min Apgar 7 and 5-min Apgar 9. The placenta weighed 375 g along with the umbilical cord. A rudimentary cord was attached to the placenta with a compressed, mummified fetus that was identified as FP (Figures 1 and 2). The FP weight was around 150 g.

Thus, the pregnancy was diamniotic and dichorionic. No complication observed in the post-partum period. Both mother and baby were discharged from the hospital after suture removal on 7th post-op day.

DISCUSSION

FP occurs in subjects with multiple gestations having one, or more of the fetuses die early in the gestational period

Access this article online



www.ijss-sn.com

Month of Submission : 05-2015
 Month of Peer Review : 06-2015
 Month of Acceptance : 07-2015
 Month of Publishing : 07-2015

Corresponding Author: Dr. Shashi Shankar Behera, Associate Professor, D/16, Staff Qrs., KIMS, KIIT, Patia, Bhubaneswar, Odisha, India. Phone No.: 09437197047. E-mail: shashibehera1971@gmail.com



Figure 1: Clinical Picture of Fetus Papyraceous



Figure 2: Rudimentary cord was attached to the placenta with a compressed, mummified fetus

(15-20 weeks). The other fetus continue to grow. In most situations the amniotic fluid disappears; the fluid of the dead tissue gradually absorbed and the fetus compressed and became incorporated to the membrane.⁴

Prior to the use of ultrasound the diagnosis of FP could be only made after delivery of the surviving twin. By transvaginal sonography a twin pregnancy can be diagnosed as early as 5 weeks of gestation and FP can be diagnosed with follow-up scan.

In our case, the pregnancy is diamniotic and dichorionic with no adverse effect on mother and the surviving fetus. But sometimes this condition can have adverse effect on both mother and surviving fetus during pregnancy. A study

by McPherson *et al.* investigated the association between chronicity and intrauterine fetal demise (IUFD) of one or both fetuses in twin pregnancies. The study was performed on 2,161 twin pregnancies; 86 had at least 1 IUFD and 32 had a double fetal loss. Consequently, they found that monochorionic pregnancies had an increased risk of a single demise (adjusted odds ratio [OR]: 1.69; 95% confidence interval [CI]: 1.04-2.75) and a double demise (adjusted OR: 2.11; 95% CI: 1.02-4.37). 70% of all double demises happened before 24 weeks.⁵ They have been put forward that monochorionic twins carry an increased risk of fetal death compared to dichorionic twins. Similarly, double demise occurs primarily before 24 weeks of gestation. In single tone pregnancies whenever there is an IUFD and the fetus stay in utero it triggers intravascular coagulation but in case of FP hematological complications are very low.⁶ Malinowski *et al.*, found that none of the live born fetuses had any evidence of hematological abnormalities.⁷ In another case reported by Bozkurt and Kara showed no maternal and fetal complications in diamniotic and diachorionic pregnancy with FP.⁸

CONCLUSION

We report a case of FP with no maternal and fetal complication during pregnancy, delivery and post-partum period. The etiology of FP could not be explained. Routine ultrasound with machines having good resolution is important for early diagnosis of FP and thus further obstetric complication can be prevented.

REFERENCES

1. Fisk NM. Multiple pregnancies. In: Edmonds DK, editor. Dewhurst's Textbook of Obstetrics and Gynaecology for Postgraduates. Oxford: Blackwell; 1999. p. 298-307.
2. Bush M, Pernoll ML. Multiple pregnancy. In: DeCherney AH, Nathan L, editors. Current Obstetric and Gynecologic Diagnosis and Treatment. New York: McGraw-Hill; 2003. p. 315-25.
3. Leppert PC, Wartel L, Lowman R. Fetus papyraceus causing dystocia: Inability to detect blighted twin antenatally. *Obstet Gynecol* 1979;54:381-3.
4. Mittal PS, Khanna M. Two papyraceous fetuses in a triplet pregnancy. *J Obstet Gynecol India* 2007;57:77-8.
5. McPherson JA, Odibo AO, Shanks AL, Roehl KA, Macones GA, Cahill AG. Impact of chorionicity on risk and timing of intrauterine fetal demise in twin pregnancies. *Am J Obstet Gynecol* 2012;207:190.e1-6.
6. Campbell S, Lees C. Multiple gestation. In: Campbell S, Lees C, editors. *Obstetrics by Ten Teachers*. London:Arnold; 2000. p. 187-95.
7. Malinowski W, Janowski J, Lokociejewski J, Rózewicki K, Tomala J. Intrauterine death of one twin in the third trimester. *Ginekol Pol* 2003;74:135-43.
8. Bozkurt M, Kara D. Fetus papyraceous in a twin pregnancy: A case report without any maternal and fetal complications. *Proc Obstet Gynecol* 2013;3:4.

How to cite this article: Senapati S, Behera SS, Nayak L, Chinara PK. Fetus Papyraceous in Twin Pregnancy: Incidental Finding during Caesarean Section. *Int J Sci Stud* 2015;3(4):168-169.

Source of Support: Nil, **Conflict of Interest:** None declared.