

Undiagnosed Placental Accretism in Uterus Didelpho Complicated with Severe Uterine Hemorrhage

Gomez D Jaider^{1*}, Briceño C Nelly² and Hernandez H Maria³

¹Specialist II in Gynecology and Obstetrics, Sor Juana Inés de La Cruz Hospital, Mérida, Venezuela

²Specialist I in Gynecology and Obstetrics, Sor Juana Inés de La Cruz Hospital, Mérida, Venezuela

³Specialist I in Gynecology and Obstetrics, Sor Juana Inés de La Cruz Hospital, Mérida, Venezuela

***Corresponding Author:** Gomez D Jaider, Specialist II in Gynecology and Obstetrics, Sor Juana Inés de La Cruz Hospital, Mérida, Venezuela.

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Abstract

We present the unexpected case of a 36-year-old patient who was scheduled for a routine abdominal cesarean section due to a history of previous cesarean section and pelvic stricture, with no significant medical history. She had received adequate prenatal care. During surgery, the patient was found to have uterus didelphys, diagnosed *in situ*, along with placental accreta of a low posteriorly inserted placenta, severe hemorrhage with progressive muscular infiltration, and uterine atony. The procedure culminated in an emergency total hysterectomy.

Keywords: Placental Accretism; Uterus Didelphys; Uterine Hemorrhage

Introduction

Uterus didelphys has a prevalence of 5% among uterine malformations according to the European Society of Human Reproduction and Embryology. It is classified as Class 3/U3bC2V1 or Class 3/U3bC2V2, characterized by incomplete fusion of the paramesonephric or Müllerian ducts during the embryonic stage, with a complete or incomplete septum at the cervical level, which can be unicollis or bicollis [1]. This anomaly may also present with longitudinal or transverse vaginal septa, as well as urological abnormalities [2].

The diagnosis of uterus didelphys is typically made in the preconception stage, either incidentally or due to symptoms requiring gynecological evaluation, through clinical, imaging, and endoscopic studies [3]. However, it can go unnoticed due to the absence of professional medical assistance or a lack of clinical-ultrasonographic expertise.

It has been described that both the didelphys and bicornuate uterus have thinner, hypovascular muscular structures with deficiencies in the extracellular matrix, affecting tensile strength and the secretory development of the endometrium, leading to recurrent pregnancy loss, preterm delivery, presentation dystocia, cervical lacerations, placental retention, placental accreta, and even the risk of uterine rupture during labor [1,2].

In this report, we describe the case of a full-term pregnancy in a patient with undiagnosed uterus didelphys, which was identified during a scheduled cesarean section, complicated by placental accreta and resulting in a total hysterectomy.

Case Description

This is the case of a 36-year-old patient from a neighboring city who attended the obstetric preoperative consultation on 7/18/2024 to schedule an abdominal cesarean section. She had a history of last menstruation on 10/20/2023, one prior pregnancy, and a cesarean section in 2019 due to pelvic stricture and severe oligohydramnios. Her child, born at 2900g, was healthy. She reported no significant pathologies or allergies, and her cytology on 1/12/2024 showed a healthy cervix, negative for intraepithelial lesions. Her prenatal check-ups, totaling seven, did not reveal any abnormalities. Ultrasounds performed by private and institutional obstetricians showed no uterine malformations or placental accreta. Preoperative assessments revealed no anomalies.

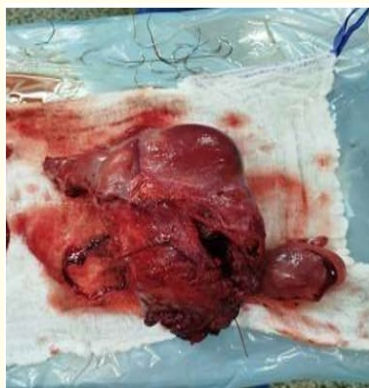
On 7/19/2024, a suprapubic laparotomy (Pfannenstiel incision) was performed under spinal anesthesia. A Kerr-type segmental hysterotomy delivered a live female newborn with an Apgar score of 8/9, weighing 2900g. Fundal compression and gentle traction on the cord facilitated placental delivery, but friable tissue remained adhered to the posterior uterine wall and the supravaginal portion of the cervix. A smaller left uterine horn, about one-third the size of the right, was noted, with ecchymotic areas. The lower uterine segment appeared ecchymotic and distended, and the septum dividing the two cervixes was indistinguishable, revealing a single cervicovaginal canal.

Although there was no visible profuse bleeding, intramyometrial and intracervical hemorrhage was evident, along with a Couvelaire uterus variant. A rapid and precise hysterectomy was performed. Postoperative blood loss was estimated at 3000 mL. The patient was admitted to intermediate care for 24 hours and then transferred to a general ward, from which she was discharged 48 hours later.

The histopathological study dated 8/21/2024 reported a uterus didelphys with placental accreta (increta type).



Photograph 1 and 2: Showing the exteriorized didelphys uterus.



Photograph 3: Showing the operative piece.

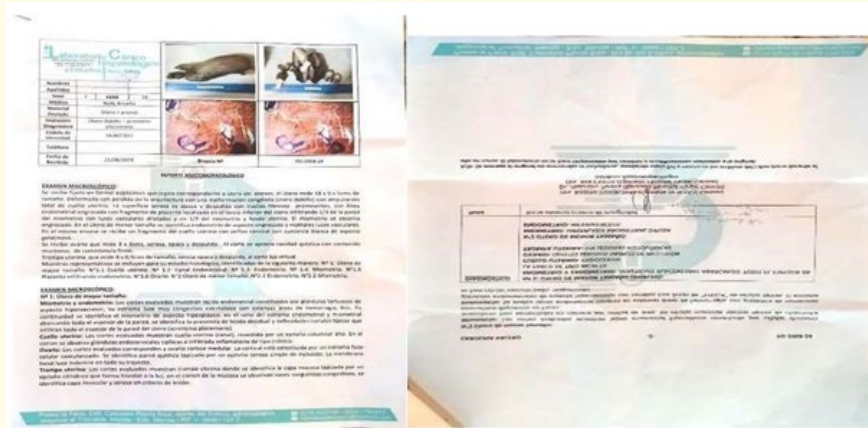


Image 1 and 2: Describing the histopathological report, confirming uterus didelphis and placental accretism.

Discussion

It is known that placental accreta is a serious problem in our time and that its incidence is increasing exponentially with the increase in cesarean sections and other surgeries that affect the uterus, especially myomectomies for infertility and abortions with uterine curettage. Furthermore, very few publications report placental accreta in Mullerian malformations, being more frequent in didelphys uteruses.

The scarcity of scientific information on the association of placental accreta and uterine malformations merits study, especially in cases of didelphys and bicornuate uteruses, whose histopathological studies describe them as having a myometrial structure, with little extracellular matrix and deficient development of the intramyometrial vasculature, making it more susceptible to biomechanical stress, which can cause pregnancy. Likewise, congenital uterine angiogenic deficiency can affect endometrial development, whose impaired secretory phase can prevent early embryonic implantation or aberrant trophoblastic implantation in accreta [4-6].

It is also interesting to note that ultrasound findings of abnormal placentation, such as the presence of the choriodecidual space, in cases of uterus didelphys are of reduced thickness, which may end up disappearing as the placenta reaches its maximum development at 24 weeks of gestation. This may explain the majority of cases of adherent placentas in uterus didelphys and a small proportion of true cases of placental accreta.

Finally, this case is one of the few published, due to its rarity, but its appearance can cause serious maternal-fetal complications. In more than 95% of the cases of placental accreta with uterus didelphys described in the literature, they ended in total hysterectomy, massive hemorrhage and the need for intensive care [6].

Conclusion

Uterus didelphys is a Müllerian variant associated with a high percentage of full-term pregnancies, so we must identify it before delivery or cesarean section, representing a risk factor for maternal-fetal complications, requiring complex complementary surgeries.

Quality control methodologies must be established in imaging studies and prenatal monitoring, before taking a pregnant woman to a scheduled cesarean section, in order to avoid dangerous surprises during surgery.

Bibliography

1. Itana de Mattos Pinto E Passos and Renata Lopes Britto. "Diagnosis and treatment of müllerian malformations". *Taiwanese Journal of Obstetrics and Gynecology* 59.2 (2020): 183-188.
2. Wang S., et al. "Perinatal outcomes of women with Müllerian anomalies". *Archives of Gynecology and Obstetrics* 307.4 (2023): 1209-1216.
3. Jorgensen C and Lusiak M. "Didelphys uterus in pregnancy, an uncommon müllerian duct anomaly: a case report". *Clinical Practice and Cases in Emergency Medicine* 5.4 (2021): 447-449.
4. Lekovich J., et al. "Placental malperfusion as a possible mechanism of preterm birth in patients with Müllerian anomalies". *Journal of Perinatal Medicine* 45.1 (2017): 45-49.
5. Tuştaş Haberal E., et al. "Placenta percreta with concomitant uterine didelphys at 18 weeks of pregnancy: a case report and review of the literature". *Journal of Maternal-Fetal and Neonatal Medicine* 29.21 (2016): 3445-3448.
6. Urushadze., et al. "Placenta increta with uterus didelphys gravidity: single hospital case report". *International Journal of Progressive Sciences and Technologies* 34.1 (2022).

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