

# Antenatal Subamniotic Haematoma

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## Background

- Subamniotic haematoma (SAH) can occur following a tear in chorionic vessels resulting in bleeding between the amniotic membrane and fetal chorionic plate.
- It can sometimes occur at delivery following excessive cord traction with the third stage of delivery due to increased umbilical venous pressure. [1]
- Occurrence antenatally is by comparison a much rarer finding. The tear in these instances may be due to fetal movements, external pressure or intravascular pressure along areas of reduced vascular wall resistance. [2]

## Aims

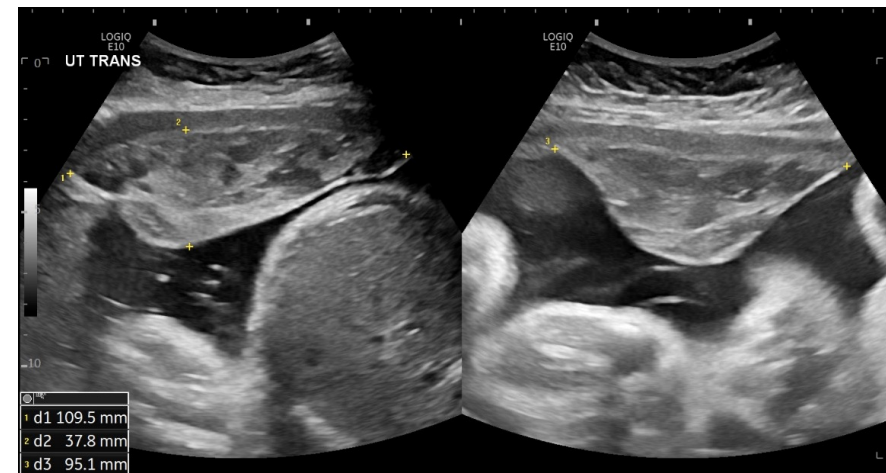
- We report a case of SAH detected following antepartum haemorrhage, initially misdiagnosed as a subchorionic haematoma (SCH).

## Case

- A 39 year old G2P1 woman presented at 34 weeks gestation with sudden unprovoked per vaginal bleeding of 150mls volume and associated cramping abdominal pain. She was also found to be positive for SARS CoV2.
- Issues in her pregnancy included diet controlled gestational diabetes mellitus, cannabis use, advanced maternal age and hyperemesis gravidarum.
- Ultrasound initially reported a SCH measuring 110 x 38 x 95 mm, however after second review this was deemed more consistent with a SAH.

## Results

- She was admitted for inpatient monitoring and steroid coverage, and had no further large bleeds.
- On repeat ultrasound 7 days after, her haematoma had decreased to 34 x 72 x 35mm.
- She underwent an induction of labour at 37 weeks with an uncomplicated vaginal delivery of a 2980g infant with Apgars of 9 and 9.
- Histopathological assessment of the placenta revealed changes consistent with previous retroplacental haemorrhage and infarction. There were also note of chorangiomas and areas with increased syncytial knotting.



**Figure 1. SAH**

Ultrasound demonstrating focal area of altered echogenicity, 11 x 4 x 10cm located at the edge of the placenta.

## Discussion

- Differentials for a cystic placental lesion can include SAH, SCH, avillous spaces and cytotrophoblastic cysts [1].
- SCH occurs due to maternal bleeding and radiologically appears as hypoechoic collection between the chorion and uterine wall. Present in over 1% of pregnancies, they are most common in the first 20 weeks of gestation. Whilst they can be benign, large SCH may lead to miscarriage, stillbirth or preterm labour. [1]
- SAH radiologically appears as a hypoechoic cystic mass with a thin membrane, situated over the fetal plate of the placenta [1]. As the blood is fetal in origin, it can be associated with fetal growth restriction, fetal distress and fetal anemia. As such, strict fetal surveillance and progress ultrasounds to monitor size may be indicated. Histopathological assessment of the placenta postpartum can confirm the relationship of the haematoma to the amnion [2].
- Thus, distinguishing between the types of haematomas can allow for targeted assessment of their potential complications.

## References

- [1] Deans, A., & Jauniaux, E. (1998). Prenatal diagnosis and outcome of subamniotic hematomas. *Ultrasound in Obstetrics and Gynecology*, 11(5), 319–323. doi:10.1046/j.1469-0705.1998.11050319.x
- [2] Owada, M., Shibata, Y., & Suzuki, S. (2019). Case series of intrauterine subamniotic hemorrhage. *Case Reports in Obstetrics and Gynecology*, 2019, 1–4. doi:10.1155/2019/1828457