Objective
We present a case of fetal triventricular hydrocephalus associated with distinct different findings in the fetal cerebellum and liver when comparing pre and post-mortem fetal magnetic resonance imaging (MRI).

Case report:
A 34-year-old, gravid 2, para 1, woman underwent prenatal ultrasound examination at 22+4 weeks of gestation which showed a triventricular hydrocephalus, along with hepatic calcification, a hyperechogenic intestine, ascites, mild pericardial effusion, and a white spot in the left ventricle without haemodynamic significance. The prenatal fetal MRI showed high-grade suspicion of cerebellar infarction as the cause of the triventricular hydrocephalus. The liver calcification, with a hyperechogenic intestine, ascites, moderate pericardial effusion, and white spots in the left ventricle were confirmed. After counselling, the couple opted for termination. The post-mortem MRI suggested a cerebellar vascular malformation with minimal bleeding and subarachnoid hemorrhage but also showed a novel finding: hemangiomatosis of the liver with minimal bleeding and under perfused liver parenchyma. Diagnostic gene sequencing panels were uneventful.

Conclusion
The use of post-mortem fetal MRI may be useful to identify pathological findings not evident in pre-mortem MRI due in part to the greater precision of the examination. Post-mortem examination of the brain is often inconclusive. The use of post mortem MRI instead of autopsy offers a non-invasive way to identify the cause of fetal malformations.