Caudal regression syndrome: A case report

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ABSTRACT

Introduction: Caudal regression syndrome (CRS) is a rare complex congenital anomaly which is characterized by agenesis of the sacral and lumbar spine. Pelvis, lower extremity, genitourinary, cardiac anomalies, neurological and motor development deficits may accompany. Maternal insulin-dependent diabetes mellitus, genetic factors, and vascular hypoperfusion may play a role in the aetiology. Case Description: We report a case of caudal regression syndrome diagnosed in utero in 23-year-old primigravida with a 12-year history of type 1 diabetes mellitus. Ultra-sonographic examination revealed a singleton fetus with biometry at the lower centile. The fetal intracranial structures appear normal. The spine curvature was normal but sudden termination of the spinous process at the coccyx level. The lower limbs were in a fixed flexion position with talipes present. We present a clinical case of a prenatal diagnosis of CRS, describing the workup and management of this patient till delivery. Discussion: Caudal regression syndrome is a rare entity, characterized by sacrococcygeal dysgenesis with an abrupt termination of a blunt-ending spinal cord. Addressing risk factors, prompt detection and supportive treatment upon delivery is very important.

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Fetal chest tube: A life saving procedure for severe fetal hydrothorax

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ABSTRACT

Introduction: Severe fetal hydrothorax can lead to unfavourable neonatal survival because it restricts fetal lung development, compromises cardiac function and limits fetal swallowing which leads to polyhydramnios and preterm labour. Fetal chest drainage reduces the pressure effect of space occupying collection. We report a case of successful management of severe idiopathic bilateral fetal hydrothorax with a percutaneous in utero thoracoamniotic shunt. Case Description: A 24-year-old primigravida presented at 30 weeks of gestation with bilateral severe hydrothorax, hydrops fetalis and moderate polyhydramnios. A fetal thoracocentesis was performed to drain pleural fluid, and the analysis of pleural fluid revealed a transudative effusion. However, severe hydrothorax recurred after three days, and an insertion of right-sided fetal thoracoamniotic shunt and a concurrent amnioreduction were performed at 31 weeks of gestation. Follow-up scans revealed a reduction of right hydrothorax with a static state of mild polyhydramnios. She underwent a planned caesarean section at 36 weeks of gestation and delivered a female fetus weighing 2,560 gram with APGAR scores of 9/9. The baby required non-invasive ventilation for 3 days. Postnatal chest radiographs showed resolution of pleural effusions and good lung volumes. She was discharged well at day 14 of life and was thriving at 6-week and 3-month postpartum visits. Discussion: Severe fetal hydrothorax, if left untreated, can lead to serious neonatal morbidity and mortality. In this case, the fetal thoracoamniotic shunt was life-saving because it improved fetal hydrothorax and enabled the pregnancy to reach a near term gestational age.