Bahrain Medical Bulletin, Vol. 33, No. 1, March 2010

## **Twin Reversed Arterial Perfusion Sequence**

Zainab Ali Abdulla Al-Jufairi, MRCOG, Arab Board\* Naeema A A Mahmood, MB&CHB, Arab Board\*\* Huda Jaffar Al-Jufairi, MBBS, Arab Board\*\*\*

Background: Twin-Reversed Arterial Perfusion (TRAP) is a rare complication of monochorionic twins with a prevalence of 1 in 35,000 pregnancies. It is characterized by a structurally normal twin pump perfusing an anomalous recipient twin via an artery-to-artery anastomosis in a reverse direction.

**Objective:** To highlight Twin-Reversed Arterial Perfusion sequence and its clinical variable presentation.

**Design: Prospective review.** 

Setting: Obstetrics and Gynecology Department, Salmaniya Medical Complex (SMC).

Method: All patients with TRAP sequence, diagnosed by ultrasound were followed up until delivery. Clinical presentation, ultrasound findings, outcome and management were reviewed.

Result: Three patients with a diagnosis of TRAP sequence who had been managed conservatively were included in the study. The first two patients had amorphous acardius and presented with polyhydramnios and both had favorable outcomes for the surviving twin. The third case was a triplet pregnancy, which ended unfortunately with extreme prematurity at 23 weeks of gestation of acephalus acardius and two normal fetuses.

Conclusion: TRAP sequence is a rare complication of monochorionic twins. Accurate antenatal diagnosis is essential to improve the prognosis of this rare entity.

Bahrain Med Bull 2011; 33(1):