Prenatal diagnosis of right aortic arch by fetal echocardiography

Diagnóstico pré-natal do arco áortico direito por ecocardiografia fetal

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Right aortic arch is a cardiovascular malformation or a variant of normality which can be diagnosed by prenatal ultrasound. This malformation may be associated with DiGeorge syndrome (arising from defects in chromosome 22) and can result in posterior compression of the trachea and esophagus, leading to dysphagia and respiratory impairment after birth.

Figure A  Right aortic arch passing posterior to the trachea. AO: aorta; PA: pulmonary artery; RV: right ventricle; SVC: superior vena cava; TR: trachea.

Figure B  4-chamber view of the fetal heart. AO: aorta; LA: left atrium; LV: left ventricle; RA: right atrium; RV: right ventricle.

The authors present images of a case with prenatal diagnosis by echocardiography, in a fetus with right aortic arch as the only structural defect.

A 21-year-old, primigravida, without relevant personal or family history, was referred at 28 weeks of gestation for fetal arrhythmia, not confirmed. However, in the same exam an isolated right aortic arch was detected (figures A and B). The authors present the images.