

# Congenitally absent right coronary artery

Wrodzony brak prawej tętnicy wieńcowej

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## Abstract

Congenitally absent right coronary artery is an extremely rare anomaly. We present the case of a young male who was incidentally found to have no right coronary artery.

**Key words:** anomaly, coronary

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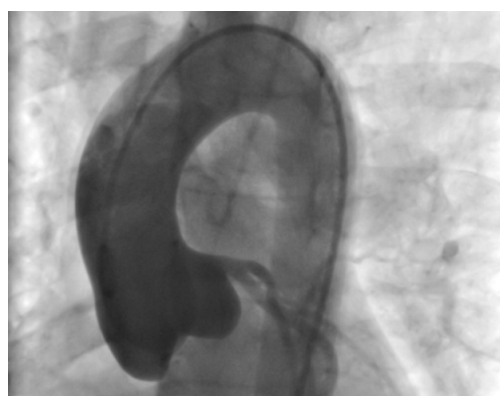
A 27-year-old male referred for aortic angiography to investigate the possibility of patent ductus arteriosus (PDA) was noted to have a congenitally absent right coronary artery (RCA) (Fig. 1) on an echocardiogram that was done as part of exertional shortness of breath work up. An aortic root angiogram did not demonstrate any evidence of PDA. However, a subsequent coronary angiogram (Fig. 2) showed a left coronary artery that gave rise to a left anterior descending artery and a large circumflex artery that continued in the atrio-ventricular groove to supply the RCA territory.

Coronary artery anomalies are found in 1.3% of patients undergoing coronary angiography [1, 2]. Congenital absence of RCA is extremely rare and accounts for about 0.003% of coronary anomalies [3, 4]. It has been reported that most congenital anomalies of the coronary arteries are benign. Only 20% are clinically relevant, and may result in arrhythmias, syncope, myocardial infarction, or sudden death [1, 2].

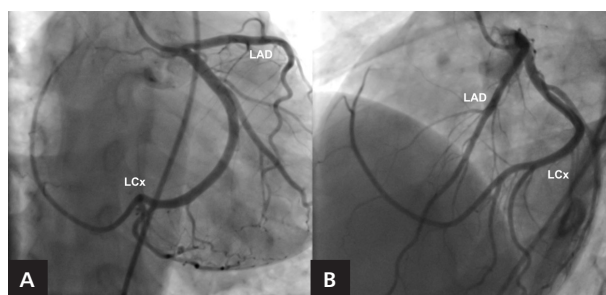
**Conflict of interest:** none declared

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**Figure 1.** Left anterior oblique — cranial view of the aortic root angiography demonstrating absence of the right coronary artery



**Figure 2.** Caudal (A) and left anterior oblique — cranial (B) views of the left coronary arteries, showing a huge left circumflex artery (LCx) extending to supply the right coronary artery territory; LAD — left anterior descending artery

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