Takayasu’s arteritis with left main stem stenosis of single coronary artery

Takayasu’s arteritis is a chronic vasculitis involving the aorta and its main branches, pulmonary arteries, and coronary tree. Coronary involvement may appear in up to one-third of patients with Takayasu’s arteritis. Occlusion of the ostia of the left main coronary artery and of proximal segments of the coronary arteries is the most frequent finding of the coronary vasculature in patients with Takayasu’s arteritis. A 58-year-old male patient with Takayasu’s arteritis admitted to our hospital with atypical chest pain. On the physical examination, there was no palpable pulse of the left radial artery, and a right-sided systolic carotid bruit was identified. Due to positive ischemic response to exercise and his physical examination findings, we decided to perform coronary angiography and aortography, which showed total occlusion of the left subclavian artery (black arrows in Figures A and C) and severe stenosis of the right brachiocephalic artery (black arrows in Figures A and B), with a normal left carotid artery giving collateral arteries to the left subclavian artery. On coronary angiogram, the left main coronary arterial stenosis (black arrows in Figures D and F) and a single coronary artery with anomalous origin of the right coronary artery from the mid left anterior descending artery (Figure E) were detected. The patient underwent surgery for his coronary and carotid arterial stenosis. The postoperative course was uneventful, and he has been free from any complication for over one year.

Figures - (A-C) Aortogram showing total occlusion of the left subclavian artery (white arrows), and severe stenosis of the right brachiocephalic artery (black arrows in A and B). (D-E) Coronary angiogram showing the left main coronary arterial stenosis (black arrows) and a single coronary artery with anomalous origin of the right coronary artery from the mid left anterior descending artery. RBC: Right brachiocephalic artery; LCA: Left carotid artery; LSA: Left subclavian artery; RCA: Right coronary artery; LAD: Left anterior descending artery; Cx: Circumflex artery.