



INTRODUCTION

- Sarcoidosis is an inflammatory disease that most commonly affects the lungs, eyes, and skin.
- While sarcoidosis is commonly associated with pulmonary disease, there is an increasingly recognized incidence of sarcoidosis solely involving the heart, termed isolated cardiac sarcoidosis (ICS).
- We present a rare case of indolent ICS presenting with a life-threatening arrhythmia.

CASE

- A 51-year-old Caucasian male presented with complains of worsening malaise, weakness, chest palpitations, and dyspnea on exertion for a year which has worsened.
- He noted a brief period of symptom relief after being treated with an oral steroid taper for a reported wheezing episode three months prior.
- Upon arrival at the ED, he developed ventricular tachycardia at a rate of 220 bpm and hypotension, which warranted synchronized cardioversion.
- His subsequent electrocardiogram showed normal sinus rhythm with ST-elevation concerning for myocardial infarction.
- He underwent emergent left heart catheterization which demonstrated non-obstructive coronaries, albeit a severely dilated left ventricle and a reduced left ventricular ejection fraction of 25%.
- CT chest showed extensive mediastinal lymphadenopathy, which was concerning for cardiac sarcoidosis without any pulmonary involvement.
- He underwent endobronchial biopsy of the mediastinal lymph node which showed non-necrotizing granuloma consistent with sarcoidosis.
- He subsequently underwent cardiac MRI which was notable for extensive areas of near full thickness patchy enhancement of the inferior and inferolateral walls and patchy areas of basal epicardial and anteroseptal walls.

DIAGNOSIS

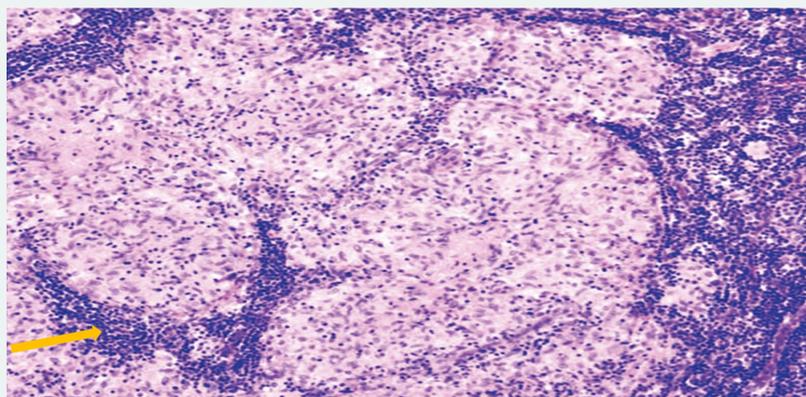


Image 1: Mediastinal lymph node with non-necrotizing granuloma.

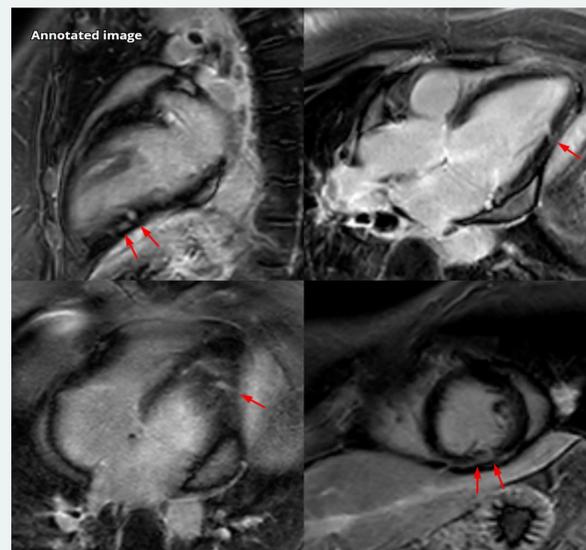


Image 2: Cardiac MRI demonstrates patchy intramural/subepicardial late gadolinium enhancement in the inferior midventricular/apical segments on IRGE images (red arrows) and reflects a granuloma or post inflammatory scar tissue.

MANAGEMENT

- Cardiac sarcoidosis was managed with oral prednisone 40 mg daily for three months, along with prophylactic sulfamethoxazole/trimethoprim and clotrimazole.
- Non-ischemic cardiomyopathy with reduced ejection fraction was managed with guideline directed medical therapy.
- A permanent automatic implantable cardioverter-defibrillator was placed for secondary prevention.
- Follow-up appointments with the advanced heart failure and transplantation teams as an outpatient were arranged prior to discharge.

DISCUSSION

- We present a rare care of an individual with no prior cardiac history presenting with ventricular tachycardia and dyspnea which are concerning for acute coronary syndrome and heart failure, but less so for sarcoidosis, which exemplifies the difficulty in diagnosing these cases.
- Individuals presenting with negative cardiac angiographic studies make it incumbent upon the clinician to consider possibility of undiagnosed ICS, especially in middle-aged patients.
- Cardiac sarcoidosis has traditionally been recognized as progression of systemic sarcoidosis with poor prognosis.
- In recent years incidence of ICS has increased due to improved testing and higher clinical suspicion.

REFERENCES

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