View metadata, citation and similar papers at core.ac.uk

brought to you by CORE

provided by Elsevier - Publisher Connector

A610
JACC March 17, 2015
Volume 65, Issue 10S

FIT Clinical Decision Making

MYXEDEMA COMA WITH MYXEDEMA HEART DISEASE

Poster Contributions
Poster Hall B1
Saturday, March 14, 2015, 10:00 a.m.-10:45 a.m.

Session Title: FIT Clinical Decision Making: Heart Failure and Cardiomyopathies
Abstract Category: Heart Failure and Cardiomyopathies
Presentation Number: 1109-151

Authors: *Muhammad Ali Chaudhry, Luanda Grazette, Michael Fong, Digant Bhatt, Pradeepto Ghosh, Nagapradeep Nagajothi, Aultman Hospital, Canton, OH, USA, University Of Southern California, Los Angeles, CA, USA*

Background: Myxedema heart disease is a rare and potentially fatal disease entity. A high index of suspicion in cases of unexplained heart failure with early administration of thyroxine can be potentially lifesaving.

Case: A 58 year old woman was admitted with three days of worsening volume overload and marked lethargy. Her past medical history included hypertension and stage 2 chronic kidney disease. On physical examination the blood pressure was 68/40 mmHg, heart rate was 69/min, there was jugular venous distension up to the angle of jaw, and moderate bilateral lower extremity edema with cool extremities. EKG showed low voltage in precordial and limb leads. Chest X- ray showed significant cardiomegaly. There was rapid clinical worsening with acute renal failure requiring continuous renal replacement therapy, acute respiratory failure requiring mechanical ventilation, and persistent hypotension requiring inotropic support with dobutamine and epinephrine.

Decision Making: Echocardiogram showed LVEF 20%, severely reduced RV function, moderate mitral regurgitation, severe tricuspid regurgitation and moderate pericardial effusion without tamponade physiology. Due to the unexplained severe heart failure and concern for cardiogenic shock, we proceeded with right and left heart catheterization. The pulmonary capillary wedge pressure was 16 mmHg, right atrial pressure 20 mmHg , cardiac index 1.2 L/min/m2,and cardiac output 1.7 L/min. There were no ischemic foci. Her clinical course was complicated by episodes of bradycardia, hypothermia, hypoglycemia and hypotension. Thyroid panel showed TSH 29, Free T4 0.5 and free T3 0.6. She was given a loading dose of intravenous thyroxine followed by high maintenance dosing along with stress dose hydrocortisone. This was followed by improvement in hemodynamics and transient resolution of symptoms.

Conclusion: This case highlights the significance of timely diagnosis and prompt initiation of therapy in patients with unexplained acute heart failure, especially in the setting of confounding clinical scenarios. Early aggressive therapeutic institution is a possible key prerequisite to favorable clinical outcome.