Abstract: 20

Mystery of acute heart failure causing a healthy man died

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On behalf: -

Topic(s):
Acute Heart Failure - Clinical

Citation:

Funding Acknowledgements:
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Case: A 65-year-old healthy man, gardener, presented to an urban hospital with a week history of blurred vision of the left eye. He also had fatigue, dyspnea on exertion and low-grade fever for 3 weeks before the onset of blurred vision. He was diagnosed in acute panuveitis of the left eye with pneumonia. On the third day of admission, he developed blurred vision of right eye. So he was sent to our hospital for further evaluation.

On arrival, his vital signs were blood pressure of 120/70 mmHg, pulse rate of 120 /min, respiratory rate of 26 /min and body temperature of 38.8 degree Celsius. Physical examination showed shortness of breath, predominantly left lung crackle and heard soft systolic ejection murmur at right upper parasternal area without any peripheral signs of infective endocarditis (IE). The laboratory data revealed marked leukocytosis. He underwent eye surgery. On the second post-operative day, he had worsening dyspnea, engorged jugular vein and still heard soft systolic ejection murmur. Endotracheal intubation was performed with few tracheal secretions. Chest X-ray showed rapid progression of left pulmonary patchy infiltration without cardiomegaly. Systemic infection with multi-lobar pneumonia were diagnosed. Then intravenous vancomycin and ceftazidime was readily prescribed.

Decision-making: By clinical suspicious of bilateral endophthalmitis, echocardiogram was perused, although wide pulse pressure and soft systolic murmur might be not specific in setting of overwhelming sepsis. Echocardiogram demonstrated a hyperechogenic and hypermobile mass, 1.7x1.5 cm in size attached to the left cusp of aortic valve (AV) causing severe aortic regurgitation. It also revealed irregularity with prolapse of anterior mitral valve (MV) leaflet with moderate mitral regurgitation (MR). He was diagnosed in infective endocarditis, unilateral pulmonary edema and impending cardiogenic shock. Intravenous antibacterial agents were given according to current guideline although all sets of blood culture were negative. Operative findings showed a vegetation of 1.5 cm in diameter, peri-annular abscess and A3-chordae rupture. Bentall’s operation and MV replacement were urgently performed. The pathological findings revealed subacute endocarditis and fungal organisms which were identified as Aspergillus fumigatus by fungal culture. He died on day-5 post-operation from septic and cardiogenic shock.

Conclusion: We reported a very rare case of disseminated aspergillosis presented bilateral endophthalmitis and infective endocarditis of the left-sided heart valve. This case also demonstrated the delay and difficulty in diagnosis of acute de novo heart failure with atypical presentation including unilateral pulmonary edema-like pneumonia mimicker, complexity with sepsis, acute severe aortic regurgitation with nearly silent cardiac murmur causing the loss of our patient.
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A Large hypermobile mass causing flail AV leaflet
B Unilateral pulmonary edema, normal heart size
C Valve specimens with large vegetation
D Severe AR with extremely steep of pressure half time
E Extremely eccentric MR jet to left pulmonary veins
F Aortic valve: H&E stain 400x