PSEUDOMONAS LUTEOLA BIOPROSTHETIC ENDOCARDITIS IN AN IMMUNOCOMPETENT ADULT

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INTRODUCTION

- Pseudomonas luteola (PL) is a gram-negative rod classified as an opportunistic organism.
- It is a rare cause of endocarditis in pediatric population[2] and in immunocompromised hosts. We report a unique case of prosthetic valve endocarditis with PL.

CASE PRESENTATION

- A 63-year-old man with a prior bioprosthetic mitral valve replacement presented with altered mentation due to sepsis with two blood cultures positive for PL.
- TEE showed a large mitral vegetation on the ventricular aspect of prosthesis.

IMAGES

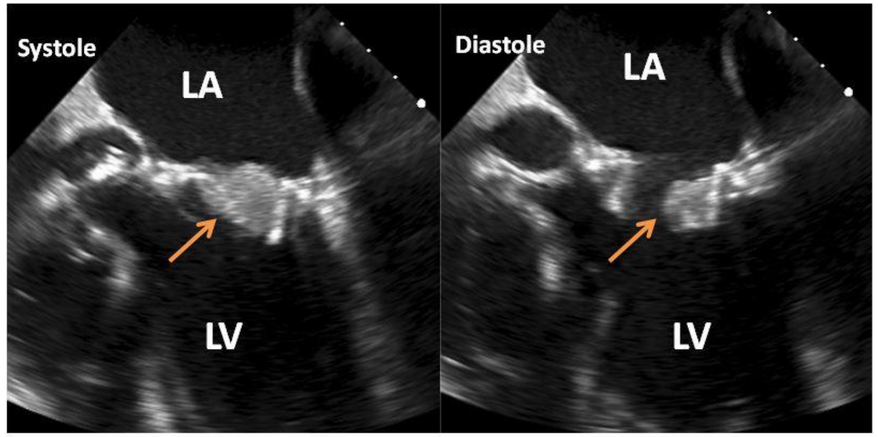

Figure. TEE systolic and diastolic still frames showing large vegetation on prosthetic valve leaflet (arrow)

- Patient subsequently had a massive stroke, and developed aphasia, requiring intubation despite antibiotic (ceftazidime) therapy.
- Stroke was thought to be due to septic emboli. Patient met the modified Duke's criteria for endocarditis (1 major and 3 minor criteria) and was felt not to be a surgical candidate.

DISCUSSION

- Our case study shows that PL is a rare cause of endocarditis.
- To our knowledge only a few cases of PL endocarditis have been reported, primarily in children and immunocompromised hosts.[1]
- The large size of the vegetation and early decision-altering embolic event indicate the need for early surgical intervention in patients with prosthetic valves and positive blood cultures for PL.

CONCLUSION

- PL is a rare cause of endocarditis in immunocompetent patients with prosthetic valves.

REFERENCES

1. Casalta JP, Fournier PE, Habib G, Riberi A, Raoult D. Prosthetic valve endocarditis caused by Pseudomonas luteola. *BMC Infect Dis*. 2005;5:82. Published 2005 Oct 12. doi:10.1186/1471-2334-5-82
2. Bayhan, Gulsum & Senel, Saliha & Tanir, Gonul & Ozkan, Sengul. (2014). Bacteremia Caused by Pseudomonas luteola in Pediatric Patients. Japanese journal of infectious diseases. 68. 10.7883/yoken.JJID.2014.051.

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