## Infective endocarditis caused by *Abiotrophia defectiva*: A case report from Malaysia

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## ABSTRACT

**Introduction:** Infective endocarditis is caused by *Abiotrophia defectiva*, a rare pathogen associated with potentially lifethreatening complications. The clinical manifestation of *A. defectiva* may vary. It is also difficult to isolate the organism. **Case report:** A healthy twenty-three-year-old man who had a history of transient ischemic attack early this year presented to the casualty with febrile and failure symptoms – shortness of breath and orthopnoea. Subsequently, cardiac examination revealed an end diastolic murmur. Echocardiography showed aortic valve and mitral valve regurgitation with vegetation. The blood culture flagged positive after 15 to 18 hours of incubation. The positive blood culture was found to be Gram-positive coccobacilli and identified by matrix-assisted laser desorption ionization-time of flight mass spectrometry (MALDI-TOF MS) as *A. defectiva*. Hence, the patient started on intravenous Ampicillin (3 grams, 8 hours a day) for three weeks. Due to clinical improvement with the course of antibiotics, the patient was subjected to completion of a 6-weeks course of antibiotics at secondary hospital care. **Conclusion:** Based on this case, it suggests A. defectiva is a rare pathogen but a critical causative organism of infective endocarditis. Early blood culture investigations and using microbial mass spectrometry are crucial to prompt diagnosis.