

## A Case of Bacteremia by *Brevundimonas vesicularis* in a Hospitalized Patient

Sir,

*Brevundimonas (B.) vesicularis* is a Gram negative aerobic, non-sporing rod. It has been isolated from various environmental sources like soil, bottled water and hydrotherapy pools.<sup>1</sup> It is not usually encountered in clinical practice but its role in Hospital Acquired Infections (HAIs), patients with underlying chronic diseases as well as immunocompetent individuals is gaining importance.<sup>2,3</sup>

The spectrum of diseases caused by *B. vesicularis* is diverse, ranging from bacteremia, septicemia, endocarditis, meningitis, peritonitis in chronic ambulatory peritoneal dialysis patients to skin infections.<sup>4</sup> We encountered a case who initially presented with jaundice due to obstruction of common bile duct. During her stay at the hospital, she developed obstruction of the placed stent and high grade fever with rigors and chills. Her blood culture sent to Armed Forces Institute of Pathology (AFIP) yielded growth of *Brevundimonas vesicularis*. The patient was given meropenem intravenously for 10 days with complete recovery. To the best of the authors' knowledge, this is the first reported case of bacteremia caused by *Brevundimonas vesicularis* in Pakistan.

The low number of reported cases limits knowledge on the spectrum of diseases caused by this pathogen as well as optimal treatment regimens. Centre for Disease Control and Prevention, USA, reported high sensitivity to aminoglycosides (98%), piperacillin (100%), carbenicillin (94%), and ceftizoxime (94%); moderate susceptibility to cefamandole (50%) and ceftaxime (75%), and lower susceptibility to penicillin (12%) and ampicillin (22%).<sup>5</sup>

Presently, there is no standardized zone interpretation criteria thus affecting actual susceptibility pattern.

A Turkish study showed variable sensitivity to antibacterials but all 8 isolates were susceptible to amikacin and imipenem.<sup>1</sup> In another report of bacteremia after open heart surgery, tazobactam-piperacillin lead to complete recovery.<sup>2</sup> Several authors have recommended single broad-spectrum anti-Gram negative antibiotic for *B. vesicularis* infections others suggest that single antibiotic may not be adequate.<sup>1</sup> This case responded well to meropenem alone.

### REFERENCES

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