

Musculoskeletal Melioidosis: A 6 Year Review Of Orthopedic Manifestation And Management

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INTRODUCTION:

Melioidosis is a tropical infectious disease with a high mortality rate that is caused by the gram negative bacillus *Burkholderia Pseudomallei*(1). It is a soil saprophyte and is endemic in South Asia, South East Asia and tropical Australia. This disease involves multiple organs such as liver, lung, spleen and other visceral organs, however involvement of the musculoskeletal system is rare and usually follows dissemination from an infection elsewhere in the body (2). It is essential to detect and diagnose this disease as it is a common cause of sepsis in the region and is associated with a high mortality rate. We conducted a 6 year review of melioidosis cases treated at our institution and outcome of treatment.

METHODS:

We performed a retrospective analysis of all confirmed cases of melioidosis obtained from medical records over a 6 year period from January 2012 to December 2017 at our institution. Demographic data, clinical presentation, and management were reviewed individually.

RESULTS:

Thirty nine patients with culture- positive for *Burkholderia pseudomallei* were identified. The median age of the patients was X (range of 9 to 75 years old). There were more male patients (n=29) than females (n=10). The presentations were septic arthritis (12 patients), limb abscesses (16 patients), osteomyelitis (2 patients), necrotising fasciitis (2 patients), and infected diabetic foot ulcers (2 patients).

DISCUSSIONS:

Melioidosis is common in the state of Pahang with a high annual incidence and mortality rate(3). We identified a total of 39 patients with a male to female ratio of 2.9:1. This is possibly due to higher exposure to soil or contaminated water while engaging in agricultural activities or occupational demands. A high proportion of our patients are diabetics (80%), which is a known risk factor for developing melioidosis.

CONCLUSION:

Melioidosis is an uncommon condition in orthopaedics that presents with challenges in management and thus requires a high index of suspicion, and aggressive management to decrease morbidity and mortality especially in endemic countries.

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