# Neither fish, flesh, nor good red herring: A case report on Cutaneous Mycobacterium Marinum Infection in a Renal Transplant Recipient.

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## Introduction

Mycobacterium marinum is a non-tuberculous mycobacterium that causes tuberculosis-like illness in fish and its transmissible to humans. Clinical manifestation in renal transplant recipients may be atypical and deserve aggressive investigations for diagnosis.

## Methodology

A retrospective and observational case study.

## Results

We report a 63-year-old male transplant recipient who presented with bilateral thigh and scrotal abscess secondary to mycobacterium marinum. He was treated with antibiotics and underwent orchidectomy for scrotal abscess. Cultures were negative and HPE findings consistent with testicular abscess. Unfortunately, his treatment was prematurely terminated as he requested for discharge. He presented after one month with multiple painful subcutaneous collection over his lower limbs which did not improve with antibiotics. A skin biopsy of the lesion was performed and it revealed granulomatous inflammation with numerous acid fast bacili consistent with cutaneous mycobacterium infection. Upon commencement of anti-tuberculous treatment, he developed multiple adverse reaction with deranged renal profile that required tailoring of treatment. During our latest clinic review, the lesions were noted to be healing well and we planned to complete treatment for a total duration of 12 months.

## Discussion

Mycobacterium marinum infection is rare post solid organ transplant and commonly present as cutaneous nodules which subsequently forms abscesses. The diagnosis is confirmed by histological and microbiological method. In our patient, the skin histology showed a mixture of lymphocytes, macrophages and polymorphonuclear leukocytes. Culture of the lesion grew mycobacterium marinum. There was marked improvement after initiation of antituberculous treatment despite multiple readjustment done due to adverse reaction. In a study of 63 cases by Aubry et al (1), the most common antibiotics used for treatment were clarithromycin, minocycline, doxycycline, rifampin, and ethambutol. The exact duration of antibiotic therapy for M. marinum infection is not defined in the transplant population, and should be individualized. The recent American Thoracic Society/Infectious Disease Society of America guidelines recommend treating M. marinum infection with 2 active antibiotics for 12 months after resolution of symptoms, and this generally translates to 34 months of total antibiotic therapy (2).

## Conclusion

In conclusion, mycobacterium marinum infection should be considered as a potential etiological agent in immunocompromised patients who present with nodular and ulcerated lesion after aquatic exposure.

**References**

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2. Griffith DE, AksamitT, Brown-Elliott BA, et al. An official ATS/IDSA statement: diagnosis, treatment, and prevention of nontuberculous mycobacterial diseases. Am J Respir Crit Care Med 2007: 175: 367-416. (Erratum 2007; 175: 744-745.)