

A case of subcutaneous infection caused by *Basidiobolusranarumin* achild

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Introduction: Chronic abscesses in children are rare. Recurrent subcutaneous infections occur due to virulent organisms like *Staphylococcus aureus*, or in patients with dermatological disorders or immunodeficiencies. *Basidiobolus* species is an occasional human pathogen causing subcutaneous infections in the thigh, trunk, buttock and perineal areas.

Case report: A 3-year-old girl presented to a local hospital in August 2020 with a history of a gradually enlarging painless, non-tender lesion of one week in the posterior aspect of the right mid-thigh. There was no associated fever or history of any trauma. Local examination revealed a lump measuring 2x3 cm. Systemic and general examination revealed no abnormalities. Sample taken for bacterial culture during incision and drainage had no growth.

The child was discharged on syrup co-amoxiclav. Poor wound healing with discharges were noted during subsequent follow-up and were managed with cleaning, dressing and antibiotics. Six weeks later wound toilet was repeated, and necrotic tissues excised. Treatment with co-amoxiclav was continued.

At follow-up after four months, healing was noted but hyperpigmentation of a vast area of the posterior mid-thigh and a subcutaneous mass solid in consistency was noticed beneath the surgical scar which raised suspicion of a deep fungal infection. The child was referred to a tertiary care hospital for further management.

Ultra-sound scans revealed an irregular hypoechoic lesion beneath the surgical scar measuring 23mmx16mmx5mm, which raised suspicion of a superficial abscess with surrounding cellulitis. Incisional biopsy was done on the 5th month since initial presentation and sent for histology and culture. Pure growth of fungal isolate on a blood agar plate was identified as *Basidiobolusranarum* at the Medical Research Institute. Histology was reported as 'suspected of fungal infection'. Treatment with oral itraconazole was started after liver function tests were done and the patient discharged on the same. Follow-up in two weeks showed significant reduction of the swelling, pain, pigmentation and induration. Treatment was continued till complete clinical recovery and for a further period of four weeks.

Discussion: Subcutaneous infections with *Basidiobolusranarum* have been reported in African and Asian countries including occasional infections in Sri Lanka. Timely suspicion of fungal aetiology could save children from treatable deformities.

Key words: *Basidiobolusranarum*, subcutaneous infection, paediatric fungal infections

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