

SCHISTOSOMAL APPENDICITIS IN A SLIDING HERNIA (CASE REPORT)

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We report a rare case of a forty-seven year old Nigeria male with schistosomal appendicitis in a sliding hernia. The clinical and pathological features of the case are discussed, followed by a review of the literature. It is concluded that a high index of suspicion is necessary to diagnose unusual presentations of schistosomiasis in an endemic area such as Nigeria to facilitate early diagnosis and adequate treatment.

INTRODUCTION

The vermiform appendix may be found abnormally in the sac of 1-2% of inguinal hernias (1). *Schistosoma haematobium* infection usually affects the urinary tract and rectum, but in endemic areas, it is not uncommonly found in the appendix (2). We report a sliding right inguinal hernia that contained an appendix with histological evidence of intense *Schistosoma haematobium* ovideposition. The case is presented to highlight the importance of early anti-schistosomal treatment.

CASE REPORT

J. A., a 47-year-old male farmer, was admitted for recurrent right inguinal swelling of seven-year duration. Examination revealed a middle-aged man in good general condition with an oval right inguino-scrotal swelling. He also had a reducible non-tender umbilical swelling. He was operated under general anaesthesia and the findings were a thick-walled hernia sac containing bowel and appendix with the caecum adherent to the posterior wall of the sac. Herniorrhaphy and incidental appendectomy were performed.

Post-operatively, he developed scrotal haematoma that necessitated exploration, evacuation as well as right orchidectomy and scrotoplasty. He was discharged in good condition but has defaulted in follow-up. The histological examination of the appendix showed mucosal atrophy, submucosal fibrosis and numerous ova of schistosoma within the lamina propria and the muscular layers. An acid-fast stain confirmed *Schistosoma haematobium* species (acid fast negative ova shell). The intensity of the infestation of the appendix was found to be grade IV corresponding to more than 10 eggs per high power field according to the method of Gelfand *et al* (high power field = x 40 objective, x 8 eye piece) (3). No ova of schistosoma were found in the urine or stool.

DISCUSSION

Schistosomiasis, a water-borne infection is one of the most wide spread parasitic disease in the world and about 300 million people are affected. It occurs frequently in Nigeria (4) and has been observed in the Sokoto area (5). Schistosomal appendicitis could be the first manifestation of infestation

of the pelvic or abdominal structures and it implies that the disease may develop later in other organs. An interesting dimension in this patient is that the infested organ was found as content of a sliding hernia. The discovery of an appendix within a hernia sac is quite fortuitous. Indeed, Claudius Amyand of St. George Hospital, in what is generally regarded as the first successful appendectomy, removed the appendix of an eleven-year old boy, whose hernia operation had revealed an appendix in the sac (6). In the normal anatomic state, the organ would be pointing to the pelvic brim and in this position it is prone to being a content of right inguinal hernia (1). Such a herniated appendix may be mistaken for an inguinal lymphadenitis. An abscess resulting from it may also be erroneously incised resulting in a faecal fistula (1). It should be emphasized that the histological diagnosis of schistosomal appendicitis merit prompt antischistosomal therapy (2) and this aspect of treatment must not be overlooked, particularly in those communities where the disease still poses a major challenge.

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