

Case Report

Retroperitoneal abscess secondary to the perianal abscess: a surgical dilemma

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ABSTRACT

Perianal abscess accounts for approximately two third of anorectal infection. Perianal abscess spreading retroperitoneally and forming extensive abscess is very rarely encountered. We are presenting a 33 year old newly diagnosed diabetic patient who presented initially with fever, pain in right loin region and burning micturition since 1 week. Patient also took care of pain during defecation. On DRE, boggy swelling was noted in right lateral wall. USG abdomen and pelvis was normal. Patient diagnosed to have perianal abscess and incision and drainage was done. Subsequently patient developed severe right loin pain and continuous high grade fever. CT abdomen pelvis was done which was suggestive of purulent content retroperitoneally extending to right loin for which incision and drainage was done. Antibiotics as per culture report administered and patient improved.

Keywords: Perianal abscess, Retroperitoneal abscess, Incision

INTRODUCTION

Perianal abscess accounts for 60% of total anorectal abscess.¹ It usually heals with adequate incision and drainage and antibiotic coverage depending upon culture sensitivity report. Perianal abscess extending retroperitoneally to the right loin and subhepatic space and forming extensive abscess is unusual.¹ However one case has been reported where ischioanal abscess extended to the anterior abdominal wall causing abdominal wall abscess. We report a rare case of perianal abscess extending retroperitoneally to the right loin and subhepatic space and causing extensive abscess in a newly diagnosed diabetic patient.

CASE REPORT

A 33 year old male patient, newly diagnosed with diabetes mellitus presented with fever, pain in right loin

region and burning micturition since 1 week. He also took care of pain during defecation. On DRE examination, boggy swelling was noted in the right lateral wall. USG abdomen and pelvis was suggestive of cystitis. Urine routine showed 10-12 pus cells. His blood sugar was 352 mg/dl and urine for ketone bodies was negative. His HIV status was negative. Patient was diagnosed as perianal abscess for which incision and drainage was done. Subsequently, patient developed severe pain in the right loin with high degree fever. On examination, blanching with indentation with abdominal wall edema noted which was suggestive of deep seated abscess. USG abdomen and pelvis revealed significant purulent collection extending to the subhepatic space. CT abdomen and pelvis showed collection in right perianal region with air foci within. The collection was seen tracking to right iliac fossa abutting the psoas muscle posteriorly and the caecum anteriorly. Superiorly, the collection was tracking up to subhepatic region. Minimal

collection was also seen in posterior pararenal space and lateral to lateral conal fascia on right side. There was no breach in the peritoneum [Figure 3-4]. Incision and drainage was done by right flank incision [Figures 1-2]. About 1500-2000 ml of foul smelling purulent discharge drained. Peritoneum was intact in its whole extent. Culture of pus yielded Escherchia coli and Enterococcus and antibiotic changed accordingly. Patients condition improved steadily with regular dressing and wound was closed by delayed primary intention after 4 weeks [Figure 5].

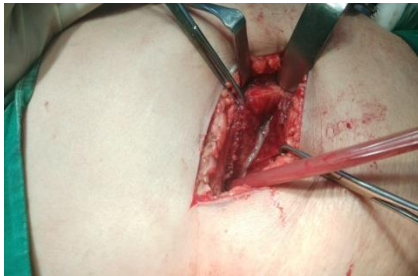


Figure 1: Per-op pictures of incision.



Figure 2: Per-op pictures of drainage.



Figure 3 and 4: CT finding of perianal abscess extending to the subhepatic space.



Figure 5: Delayed primary closure done after 4 weeks.

DISCUSSION

Anorectal abscess is one of the common surgical problem encountered in routine practice. The most common cause is non-specific cryptoglandular infection. Other less common cause includes Crohn's disease, hidradenitis suppurativa etc. Depending upon the site anorectal abscess classified into perianal, ischiorectal, intersphincteric and supralelevator.

Perianal abscess constitute about 60% of the total anorectal abscess. The infection originates into the intersphincteric space in any one of the perianal gland. It can extend upward to form supralelevator abscess. It often presents with pain in the perianal region with fever. Patient with known case of diabetes or having immunocompromised status are commonly affected.

The complications associated with it is either it opens up externally in perianal skin or internally into the anal canal leading formation of fistula in ano. However in immunocompromised patients the clinical presentation may not be typical with the abscess presenting at unusual anatomical location¹.

Abdominal wall abscess usually have underlying intraabdominal pathology like appendicitis, diverticulitis, malignancy etc.^{2,3} It may be secondary to colonic malignancies which infiltrate abdominal wall and ruptured resulting in abscess formation.^{4,5} Ischiorectal abscess extending up to the anterior abdominal wall forming extensive abdominal wall abscess has been reported.⁶ Only one case of necrotizing fasciitis of abdominal wall following perianal abscess was reported⁷.

The treatment of perianal abscess is adequate drainage with simple skin incision which has to be put as close as possible to the anal verge without injuring the underlying sphincter muscle followed by adequate antibiotic coverage as per the culture sensitivity report.

The present case is very rare instance of perianal abscess extending retroperitoneally to the right loin and subhepatic space with extensive abscess formation.

CONCLUSION

This case has been reported to emphasize that in immunocompromised patients, the clinical presentation may not be typical, with the abscess presenting at unusual anatomical location. A carefully elicited history with high degree of clinical suspicion aided with imaging studies like USG and CT abdomen and pelvis may help in arriving at an appropriate diagnosis and guide in decision making.

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