Cricket Ball, Rectum Foreign Body: Case Report And Review Of The Literatures

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Abstract

Rectal foreign bodies are not rare problem, successful management reported in majority of early non-complicated cases.

Methods: A case of rectal foreign body reported, and a medline search performed using "foreign bodies of the rectum" and the most recent articles reviewed.

Results: A rectal foreign body case admitted to the accident & emergency department with an acute abdomen. Clinical and radiological evidence of bowel perforation was confirmed. Surgical removal of a 6cm soft ball from the rectum and Hartman's procedure performed and the patient responded to intensive therapy. On the 25th postoperative day he developed severe pneumonia and died on the 33rd day because of multi-organ failure syndrome.

Conclusion: Rectal foreign bodies can be very risky especially if they are accompanied by perforation. Early presentation of the patient is the key factor to achieve a successful outcome.

CASE REPORT

60 years old man admitted to the accident and emergency unit with 3 days history of generalised abdominal pain. It started as sudden onset at lower abdomen then it became generalized, of moderate severity, continuous in nature, not radiating, associated with fever, nausea and vomiting and constipation. The patient told a story of foreign body (a ball) been inserted by patient himself for pleasure. He is otherwise psychologically stable.

Past history: Inconclusive a part from hypertension.

Past surgical history unremarkable.

EXAMINATION

Temperature: 39.3degree centigrade,

Blood pressure: 164/70 mmgh

Pulse rate 120/minute regular, of low volume.

Chest and heart examination were unremarkable

Abdomen is distended with tenderness and peritonism, bowel sound negative, Rectal examination: a ball can be felt by the tip of index finger but no bleeding.

Blood test:

HB: 10.4 gm/DL, WCC: 29000 X10^9 /L, MCV: 80 fl, MCH: 25.4 pg. liver functions showed mildly elevated liver enzymes but normal bilirubin.

, urea 14.5 mmol/L, creatinine 168 micro mol/L and normal electrolytes

Chest x-ray showed free air under hemi diaphragms and the plain abdominal x-ray showed dilated small and large bowel loops.

Exploratory laparotomy performed and the operative findings were:

Anterior perforation of sigmoid colon (about one cm in diameter) with faecal peritonitis and the pelvis was filled with faeces.

Hartman's operation performed because part of the recto sigmoid junction was ischemic and unhealthy. The
peritoneum washed with saline irrigation and the abdomen closed with drainage.

The patient shifted to ITU and did well in the first day. Stoma started to function and his urine output was maintained. However on the 25th day he developed pneumonia with worsening of renal, liver and respiratory functions and required high inotropes. He died on the 33rd day.

**Figure 1**
Figure 1: The cricket ball about 6cm in diameter

**Figure 2**
Figure 2: Free air under diaphragm on chest x-ray

**DISCUSSION**
Rectal foreign bodies (RFBs) constitute a relatively rare problem; however, its incidence may be expected to increase (1).

A detailed clinical history and physical examination are essential for the diagnosis and management of these lesions (2). In the vast majority of the patients the aetiology was sexual pleasure but also sexual assault reported in certain patients. Men have the high incidence compared to women (3) and the rectum and sigmoid colon are the commonest sites for the lower gastro-intestinal tract foreign bodies.

The presentation of these patients varies from asymptomatic case to a florid peritonitis depending on the type of the RFBs, time of insertion, the way of insertion and the presence or absence of non professional intervention to retrieve them.

History, examination, and plain radiology films in addition to proctoscopy or sigmoidoscopy are the usual diagnostic armamentariums in these cases.

As in any acute abdomen, authors stress the importance of the removing of the foreign bodies as soon as possible. (4)
Among the foreign bodies prevailing were plastic and glass bottles, cucumbers and carrots, wooden and rubber objects in the from of the phallus (6). Other objects have been reported as well.

The indications for urgent surgical treatment for upper GIT foreign bodies were sticking of the FB, peritonitis, perforation, bleeding, gastrointestinal obstruction (7) and these constitute essentially the same indications for urgent removal of RFBs.

With adequate sedation, most RFBs can be extracted transanally either in the emergency department or operative suite under direct vision. Sigmoidoscopy is required following extraction to evaluate mucosal injury or perforation (8). Although foreign objects located in the sigmoid colon can be retrieved at the bedside, these cases are more likely to require operative intervention (8).

Because of the potential complications, rectal foreign bodies should be regarded seriously and treated expeditiously (9).

Removal of RFBs is highly successful at day case setting, but admission and operative intervention is needed in minority of the patients who developed signs of perforations, peritonitis, bleeding, and obstruction, pelvic sepsis (10). This intervention could be a proctoscopy, sigmoidoscopy retrieval of RFBs, or laparotomy with subsequent stoma, closure of perforation or Hartman's procedure. End-sigmoid colostomy and mucous fistula, over sewing of the perforation and peritoneal irrigation (11) is another option.

The mortality, generally low especially in early perforation or peritonitis.

In our case the history of three days perforation was consistent with operative findings of faecal peritonitis with dead segment of the recto sigmoid area which possibly due to self extraction trial or trauma by using other materials of sexual pleasure. The patient survived the second exploration. His renal, liver functions improved however, he developed severe chest infection.

Late presentation explained by embarrassment feeling of the patient, and we think this is the major playing factor in the outcome of our case.

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