Diagnosis and management of psoas abscess in Crohn's disease[1]

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Summary: Four patients with Crohn's disease complicated by psoas abscess are described. These patients did not have general or abdominal signs of sepsis but they all showed wasting of the right quadriceps femoris and hip flexion. It is important to examine the hip and thigh in patients with known Crohn's disease who are on medical treatment. Surgical treatment of a Crohn's psoas abscess should include resection of recurrent disease, fashioning of the anastomosis remote from the abscess cavity, and long-term (21 days) drainage of the abscess cavity to avoid the possibilities of faecal fistula or recurrent abscess.

Introduction

Psoas abscess has been described in association with Crohn's disease of both large bowel (Goligher 1975, Greenstein *et al.* 1975) and small bowel (Van Patten 1954, Hardcastle 1970, Kyle 1971, Burel *et al.* 1980, Von Dongen & Lubbers 1982). With longstanding Crohn's disease this complication may develop insidiously, without the usual physical signs of an abscess. In this paper attention is drawn to the importance in diagnosis of two physical signs, flexion deformity of the right hip and wasting of the quadriceps femoris muscle, and the management of this condition is discussed.

Patients

Four patients with longstanding Crohn's disease (4–6 years) who were under regular review in the gastroenterology clinic developed a psoas abscess (Table 1). All were known to have had a palpable mass in the right iliac fossa for up to 2 years before the abscess became apparent. Two of them had had a right hemicolectomy in the past. Two patients appeared to be less well at follow up; they had no increase in bowel frequency or abdominal pain. There was no change in size of the abdominal mass but they were noted to have a flexion deformity of the right hip and wasting of the quadriceps femoris. Two patients presented to the orthopaedic surgeons, between visits to the gastroenterology clinic, with an irritable hip and back pain: on examination, both patients had some degree of flexion deformity of the right hip and wasting of the quadriceps femoris.

All patients had a laparotomy at which a large psoas abscess was drained and a localized resection of the enterocolonic Crohn's disease performed. Great care was taken to fashion the anastomosis at some distance from the abscess cavity and, if possible, omentum was interposed between the cavity and the resection line. The abscess cavity was drained for 21 days.

Discussion

Abscess formation, including psoas abscess, is well documented in Crohn's disease. It is rare for Crohn's disease to present for the first time with a psoas abscess (Ramus & Shorey 1975) but it is a relatively common site of abscess formation in patients with longstanding disease.

[1]Accepted 14 September 1983

0141–0768/84/010033–02/$01.00/0

Table 1. Patients with Crohn's disease complicated by psoas abscess

Patient	Sex	Age at presentation (years)	Previous treatment	Duration of medical treatment for recurrent disease (years)	Drugs	Wasting of quadriceps femoris	Hip flexion
1	F	22	Right hemicolectomy	4	Sulphasalazine	+	+
2	M	35	Right hemicolectomy	6	Sulphasalazine and steroids	+	+
3	F	28	Laparotomy; no resection	6	Sulphasalazine	+	+
4	M	45	Medical; no operation	5	Steroids and sulphasalazine	+	+

Where recurrence occurs after resection, the bowel is more likely to lie in direct contact with the psoas sheath and hence facilitate psoas abscess formation.

Diagnosis of this complication in Crohn's disease may be difficult. Profound weight loss, as noted by Burel *et al.* (1980) and Von Dongen & Lubbers (1982), was not a distinctive symptom in our patients. In addition, general symptoms of sepsis may be suppressed. However, in our experience the classical physical signs of a psoas abscess – flexion deformity of the hip and wasting of the quadriceps femoris muscle – are always present. For this reason, we would like to stress the importance of examination of the hip in patients being followed up with recurrent Crohn's disease.

Invasive investigations of these patients to define a fistulous communication or needle aspiration of such abscesses are inappropriate. Surgical drainage of the abscess alone commonly results in recurrent abscess or fistula formation (Greenstein *et al.* 1975, Kyle 1971, Ramus & Shorey 1975, Burel *et al.* 1980). Recurrent abscess formation is much less common, although not unknown (Von Dongen & Lubbers 1982) after bowel resection and abscess drainage. None of the patients described here required re-exploration. We believe that protection of the enteric anastomosis from the abscess cavity and prolonged drainage with a non-irritative soft drain (silastic or latex) for not less than 21 days are important factors. We have not found it necessary to resort to sinograms, as suggested by Von Dongen & Lubbers (1982).

References

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