Mesenteric Panniculitis - A rare case report

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Abstract:

Mesenteric panniculitis is a nonspecific inflammatory process affecting the adipose tissue at the root of the mesentery. It is characterized by the association of inflammation, necrosis or fibrosis involving the adipose tissue of the bowel mesentery. The pathophysiology being unclear. Abdominal CT plays an important role in suggesting the diagnosis. Medical treatment may consist of therapy with anti inflammatory or immunosuppressive agents. Surgical treatment should be exclusively attempted when intestinal obstruction or ischemia occur. Here we are reporting rare case of mesenteric panniculitis with APD.

Introduction:

Mesenteric panniculitis - also called as mesenteric lipodystrophy; retractile mesenteritis; Weber–Christian disease. It was first described in the medical literature by Jura et al. as 'retractile mesenteritis' in 1924 and further labbeled as 'mesenteric panniculitis'by Odger in 1960. Most studies have shown the disease with a male/female ratio of 2-3:1.

The clinical presentations vary according to the stage of the disease and they include abdominal pain, weight loss, nausea and vomiting. Most patients present a benign, slowly progressive course, and the outcome of the disease is usually favorable.

Case Report:

A 58 year old female patient presented with vague pain in the upper abdomen, continuous type, non radiating, and without any aggravating and relieving factor not associated with vomiting and bowel disturbances. She was diagnosed with antral gastritis with GERD six months ago. Since then she was on levosulpride. Clinical examination vitals were stable, abdomen examination revealed mild tenderness in the epigastric region and early parkinsonism features. Routine blood investigations were unremarkable. CT abdomen revealed findings consistent with Mesentric panniculitis. Surgery opinion was sought for and they opined conservative management considering it to be an uncomplicated mesenteric panniculitis.

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Discussion:

Mesenteric panniculitis has been estimated to affect 1% of the population based on findings at over 700 postmortem examinations.

There is a slight male preponderance with a 1.8:1 ratio reported in some series.²

The aetiology is unknown but causative factors which have been postulated include infection, trauma and ischaemia.³ Other factors, such as gallstones, coronary disease, cirrhosis, abdominal aortic aneurysm, peptic ulcer, or chylous ascitis, have also been linked to this disease. More recent studies have shown a strong relationship between tobacco consumption and panniculitis.⁴

Patients usually present with vague abdominal fullness and pain in the upper or central abdomen. There may also be nausea, altered bowel habit and lethargy. The most common physical finding is a poorly defined mass or masses in the right upper quadrant. Rectal bleeding is an unusual presentation for mesenteric panniculitis. 8

Laboratory investigations are usually grossly normal. One study found that 60% of patients had a raised erythrocyte sedimentation rate. Neutrophilia, increased erythrocyte sedimentation rate or anemia have been reported occasionally in the retractile mesenteritis stage.

Imaging is perhaps the most useful non-invasive investigation for mesenteric panniculitis. In general, CT changes consistent with mesenteric panniculitis include encapsulated, heterogeneous masses localised to the root of the mesentery or adjacent intestinal loops. The 'pseudotumoural stripe' has previously been suggested to be pathognemonic of mesenteric panniculitis, especially when seen in conjunction with mesenteric vessels which

are surrounded or displaced by fat but not invaded.9

CT findings in mesenteric panniculitis varies depending on the predominant tissue component (fat necrosis, inflammation, or fibrosis)⁹. It is visualized usually as a heterogeneous mass with a large fat component and interposed linear bands with soft tissue density in cases of mesenteric panniculitis.

Colonoscopy is usually unrevealing, since mesenteric panniculitis is extrinsic to the bowel. Paracentesis that reveals inflammatory cell populations without mitotic figures can also aid diagnosis.⁵

Definitive diagnosis is made by histopathological evaluation of tissue either resected at laparotomy or sampled via laparoscopic of CT-guided biopsy.

Macroscopically, the mesentery is enlarged and may be diffuse, nodular or multi-nodular — mimicking a malignant neoplastic change or a lymphoma. Microscopically, mesenteric panniculitis is distinguished by the presence of multiple anomalous fatty cells with foamy cytoplasm and infiltration by monocytes, lymphocytes, lipid-laden macrophages and giant cells.⁶

Treatment may be attempted with a variety of drugs including steroids, thalidomide, cyclophosphamide, progesterone, colchicine, azathioprine, tamoxifen, antibiotics and emetine, or radiotherapy, with different degrees of success.⁷

Surgery may be attempted if medical therapy fails or in the presence of lifethreatening complications such as bowel obstruction or perforation.⁷

Conclusion:

Mesenteric panniculitis is a rare clinical entity that occurs independently or in association with other

disorders. Diagnosis of this nonspecific, benign inflammatory disease is a challenge to the treating physicians. CT features are usually highly suggestive of the disease. Open biopsy seems rarely necessary. There is no standardized treatment, and it may consist of anti-inflammatory or immunosuppressive agents.

Surgical resection is indicated only when the advanced inflammatory changes become irreversible or in cases of bowel obstruction.

Overall prognosis is usually good and recurrence seems to be rare.

References:

- 1. Kuhrmeier A. Mesenteric lipodystrophy. *Schweiz Med Wochenschr* 1985; 115:1218–24.
- 2. Catalano O, Cusati B. Sonographic detection of mesenteric panniculitis: case report and literature review. *J Clin Ultrasound* 1997; 25: 141–4.
- 3. Ege G, Akman H, Cakiroglu G. Mesenteric panniculitis associated with abdominal tuberculous lympheadenitis: a case report and review of the literature. *Br JRadiol* 2002; 75: 378–80.
- Patel N, Saleeb SF, Teplick SK. General case of the day. Mesenteric panniculitis with extensive inflammatory involvement of the peritoneum and intraperitoneal structures. *Radiographics* 1999; 19: 1083-85
- Delgado Plasencia L, Rodríguez Ballester L, López- Tomassetti Fernández EM, Hernández Morales A, Carrillo Pallarés A, Hernández Siverio N. [Mesenteric panniculitis: experience in our center] Rev Esp Enferm Dig 2007;99:291-97
- Gu GL, Wang SL, Wei XM, Ren L, Li DC, Zou FX. Sclerosing mesenteritis as a rare cause of abdominal pain and intraabdominal mass: a cases report and review of the literature. Cases J 2008; 1: 242
- 7. Parra-Davila E, McKenney MG, Sleeman D, Hartmann R, Rao RK, McKenney K, Compton RP. Mesenteric panniculitis: case report and literature review. *Am Surg* 1998; 64: 768-71
- 8. Khachaturian T, Hughes J. Mesenteric panniculitis. *Western J Med* 1988; 148: 700–1
- Mata J.M., Inaraja L, Martin J, Olazabal A, Castilla MT. CT features of mesenteric panniculitis. *J Comput Assist Tomogr* 1987; 11: 1021–3.

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