DOI: 10.7860/JCDR/2015/15085.6653

Internal Medicine Section

Pancreatic Lipomatosis: Complete Replacement of Pancreas by Fat

PAURUSH AMBESH¹, HIRA LAL²

Keywords: Abdominal CT, Fatty infiltration, Malabsorption

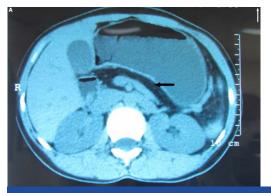
Dear Sir,

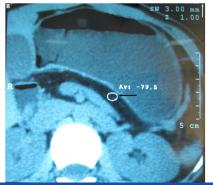
A young female aged 19 years, presented with chief complaints of foul smelling stools with increased frequency of 3-4 times a day for the last ten years. Stools were copious in amount, were difficult to flush and floated in the pan. Diarrhea was aggravated by eating fatty food. She had a past history of failure to thrive during infancy, was admitted once at the age of 10 years and diagnosed with pancreatic insufficiency. Pancreatic enzyme supplements were started. Her diarrhoea improved but the patient was then lost to follow up. During current visit, patient reported that she had not been taking enzyme supplements since the last 5 years. Instead, she had started consuming some herbal medication, but had stopped that as well 2 years back. There was no history of jaundice/pruritus/pale stool/osmotic symptoms or any signs suggestive of pancreatitis/ pancreatic cancer/early onset diabetes. Physical examination was unremarkable. Clinical biochemistry and labs yielded normal results. Stool fat content was 20 droplets/hpf. X- ray of the hip and knees were essentially normal.

Computed Tomography (CT) abdomen revealed total homogenous replacement of the pancreas by fat [Table/Fig-1-3]. An Attenuation value (Av) of -79.5 Hounsfield units (HU), characteristic of fatty tissue

was seen in the region of the pancreas. Neither any calcification nor any intrapancreatic mass was visible. The pancreatic ducts were of normal calibre. Endoscopic retrograde cholangio pancreaticography showed normal study.

Pancreatic lipomatosis is a very rare disorder that manifests as fatty infiltration or replacement of the pancreas. The fatty change may be either focal or total in extent. Shwachman-Diamond syndrome, a diagnostic possibility in our patient, is usually associated with the condition. Though the aetiology is not fully understood, other common differentials are advanced age, diabetes mellitus, pancreatitis, cystic fibrosis [1], obesity, cushing disease and pancreatic duct blockage [2]. Viral infection has also been postulated [3,4]. Symptoms at presentation can be variable. Mostly they depend on extent of fatty replacement. Minor focal fat replacement is usually asymptomatic. However, diarrhoea and abdominal pain are common early symptoms. Symptoms of malabsorption are the most common. Infrequently, local obstruction of duodenal loop may occur. Thus, clinicians must also think of total pancreatic lipomatosis as a possible differential diagnosis in a patient with malabsorption. Abdominal CT can be reliably used to rule out the disease.







[Table/Fig-1]: CT scan showing complete replacement of pancreas by fat [Table/Fig-2]: CT scan showing attenuation value of -79.5 HU, characteristic of fat in region of pancreas [Table/Fig-3]: Contrast CT shows complete pancreatic atrophy

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PARTICULARS OF CONTRIBUTORS:

- 1. Resident, Department of Internal Medicine, Moti Lal Nehru Medical College, Allahabad, India.
- 2. Assistant Professor, Department of Radiology, Sanjay Gandhi Post Graduate Institute of Medical Sciences, Lucknow, India.

NAME, ADDRESS, E-MAIL ID OF THE CORRESPONDING AUTHOR:

Dr. Paurush Ambesh.

Resident, Department of Internal Medicine, Moti Lal Nehru Medical College, Allahabad-211001, India. F-mail: paurush17@gmail.com

FINANCIAL OR OTHER COMPETING INTERESTS: None.

Date of Submission: Jun 01, 2015 Date of Peer Review: Jul 15, 2015 Date of Acceptance: Aug 28, 2015 Date of Publishing: Oct 01, 2015