



ORIGINAL RESEARCH PAPER

Surgery

A RARE CASE REPORT OF GIANT INTRA-ABDOMINAL LIPOSARCOMATOSIS PRESENTED AS ABDOMINAL LUMP IN TERTIARY CARE HOSPITAL IN SOUTH GUJARAT

KEY WORDS: liposarcoma, mesenchymal, abdominal lump, obstruction, mesentery

Dr Yash Mehta *	3rd Year Surgical Resident, Department of General Surgery, Government Medical College, Surat, Gujarat *Corresponding Author
Dr. Jignesh Shah	Additional Professor, Department of General Surgery, Government Medical College, Surat, Gujarat
Dr. Virali Jadafiya	3rd year surgical Resident, Department of General Surgery, Government Medical College, Surat, Gujarat
Dr. Harsh Oza	2nd year surgical Resident, Department of General Surgery, Government Medical College, Surat, Gujarat

ABSTRACT

Liposarcoma is a malignant tumor of mesenchymal origin that can occur wherever fat is present. Liposarcomas represent 20–30% of adult soft tissue tumours and its abdominal localisation occurs only in 5% of cases. Most are asymptomatic, but few present with abdominal mass and pain, fatigue, nausea, vomiting.[1] Here we aimed to report a rare case of a giant liposarcoma which originated from mesentery. A 45-year-old newly diagnosed hypertensive female with complain of diffuse abdominal lump with occasional vague pain with early satiety with fullness over abdomen with no obstructive features like vomiting or constipation for 1 year. Exploratory laparotomy with excision of mass was done and HP-examination confirmed a diagnosis of Well-Differentiated Liposarcoma-FNCLCC (French federation of cancer centre sarcoma group) Grade 1. Postoperative recovery was uneventful, and patient remains under regular follow-up with no signs of recurrence since 6months.

INTRODUCTION

Liposarcoma of abdomen is a rare lesion consisted of malign fat cells and accounts for approximately 20% of all mesenchymal malignancies in adults. [2][4]. Abdominal liposarcomas are located in retroperitoneum; it is often difficult to collect pathological samples non surgically. [3][4]. A search of the English literature has revealed less than 30 documented cases. In the literature review, intra abdominal lipomas do not cause any intestinal symptoms in most cases, as it usually allows the passage of intestinal [7][8]. we aimed to report a rare case of a giant liposarcoma noted in pre peritoneal and pelvic cavity, displacing the abdominal organs yet with no obstructive symptoms of vomiting /obstruction /constipation /Urinary complains. The final diagnosis was established by pathological examination and immunohistochemical study after a totally excision of the tumor.

Case Report

A 45-year-old newly diagnosed hypertensive female presented with diffuse vague pain over abdomen with early satiety and abdominal fullness , with no history of obstructive symptoms for 1 year. No significant personal or family or medical history. On per abdominal examination, abdomen is soft with vague abdominal lump with ill define margins , distended but non tender. There was no nausea, vomiting, lower extremity edema, urinary complains or constipation.

CECT findings: A large lobulated non enhancing fat density lesion (avg. HU-104) noted in pre peritoneal and pelvic cavity, displacing the abdominal organs. The above-mentioned lesion appears to bulge into peritoneal cavity noted. Approximately (84x49) mm sized mixed density lesion with minimal post-contrast enhancement and predominant fat content in it noted in pelvic cavity in left side. This lesion shows a small nodular lesion in its left lateral aspect which shows significant post contrast enhancement. P/O: Diffuse intraabdominal (pre peritoneal and pelvic) lipomatosis likely with suspicious malignant transformation in pelvic component. Few tiny angiomyolipoma in left kidney.

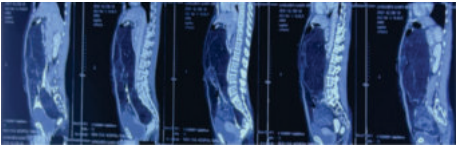


Figure 1: Photograph showing CT abdomen pelvis with

findings of well-defined fat density lesions with soft tissue component

Intraoperative findings: Exploratory laparotomy with excision of mass under General anaesthesia was done. (Intraop: Approximately 20*15*10 cm3 sized pedunculated soft tissue swelling displacing bowel loop with its stalk connecting with 10 cm length of mesentery of sigmoid colon was found which was removed successfully along with other two small liposarcomas on both side of rectal mesentery and was weighing approx 5.6kg)

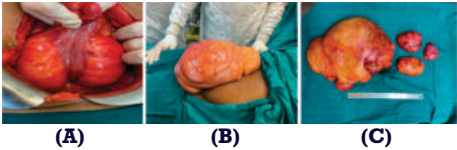


Figure 2: A) Show stalk connecting with mesentery of sigmoid colon B) intraoperatively finding of liposarcomatosis C) Excised specimen of liposarcomatosis

Histopathological examination: histological features are suggestive of Well Differentiated Liposarcoma. FNCLCC (French federation of cancer centre sarcoma group) Grade 1

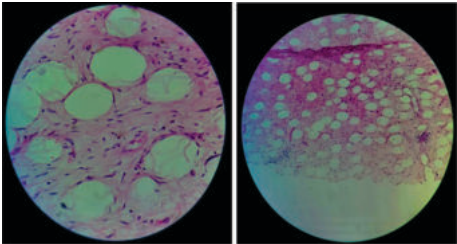


Figure 3,4: variable sized matured adipocytes along with lipoblasts

[Image courtesy of department of pathology, government medical college, Surat)

Outcome and Followup: Post operative period was uneventful without any complication. patient kept for observation postoperatively. No Chemotherapy / radiotherapy required. Regular follow-up and surveillance

with interval of 6 months

DISCUSSION

World Health Organization's (WHO) classification of tumours, liposarcomas are divided into 5 groups, namely well differentiated (WDLPS) (45%), dedifferentiated (DDLPS) (20%), pleomorphic (PLS) (10%), round cell (RC) (5%) and myxoid type (rare). It has been found that most giant liposarcomas have been observed as dedifferentiated subtypes.[9][10]. Tumor size (>20 cm), histological subtype and tumor dissemination are considered among important prognostic factors [11]. Liposarcomas are rarely confirmed with metastasis through the lymph gland. Thus, it is not essential to perform regional lymphadenectomy. The recurrence rate can be reduced by completely removing the tumor and the surrounding suspicious adipose tissue.[12] The primary aim of the surgery is complete resection with negative margins. However, in many cases, it is not possible to perform complete resection because of the tumor being too large or invasive to organs around it or its relation with the great vessels. There is continuing research and debate on the use of intraoperative radiotherapy (RT), adjuvant RT, preoperative RT, preoperative intensity-modulated RT (IMRT), preoperative chemoradiotherapy, preoperative chemotherapy, and adjuvant chemotherapy.[13]

CONCLUSION

Most of the abdominal lipomatosis are not reported due to their silent nature or as they do not produce any symptoms. But they can be multiple in numbers and can variable length in size as well as in shape. Surgical management is mostly needed but abdominal liposarcomas have potentially good outcome as they have exceptionally low rate of invasion into adjacent organs. Liposarcoma being closely attached to mesentery of bowel and its relations with great vessels sometimes it is difficult to treat or excise it completely.

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