Case Report

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An unusual origin of liposarcoma in an elderly man: a case report

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ABSTRACT

Liposarcoma is a type of cancer with mesenchymal origin in which the bulk of tumor differentiates into adipose tissue. Liposarcoma can be found in any part of the body with fat cells, but most cases occur in the muscles of the limbs or in the retroperitoneum. Here we report a case of an elderly man with an uncommon origin of liposarcoma. A 76-year-old man presented to hospital with gastrointestinal symptoms and a palpable mass over lower abdomen. Abdominal computer tomography revealed colonic tumor with another huge intraperitoneal mass, looks like originated from mesentery of small intestine. The patient underwent an exploratory laparotomy. During operation, despite colon cancer, a 17cm mass, originated from distal ileum mesentery was noted. The specimen histopathology of the tumor resection showed well-differentiated liposarcoma with prominent myxoid stroma. Finally, the patient was discharged on the tenth postoperative day. Most of liposarcomas origin from the extremities, retroperitoneum and inguinal region. However, we have chance to find liposarcomas everywhere in our body. In our case, it was a liposarcoma derived from mesentery of small intestine and it had few reports before.

Keywords: Liposarcoma, Mesentery, Origin, Case report

INTRODUCTION

Liposarcoma is a type of cancer with mesenchymal origin in which the bulk of tumor differentiates into adipose tissue.1 Liposarcoma can be found in any part of the body with fat cells, but most cases occur in the muscles of the limbs or in the retroperitoneum. Here we report a case of an elderly man with an uncommon origin of liposarcoma.

CASE REPORT

A 76-year-old man was presented to hospital with diarrhea, poor appetite and body weight loss about 5 kilograms for months. An impressive finding was that he had a huge, palpable mass over lower abdomen. During physical examination, the mass was soft, not movable and not tenderness. Laboratory blood test disclosed no significant abnormal. Abdominal computer tomography revealed colonic tumor with another huge intraperitoneal mass, looks like originated from the mesentery of small intestine (Figure 1). We had done colonoscopy and tumor biopsy to confirm that the colonic tumor was adenocarcinoma. The patient underwent an exploratory laparotomy few days later. During operation, despite colonic tumor, a 17×12×10 cm mass, originated from distal ileum's mesentery was noted. This bulging tumor has smooth surface with soft and pudding-like texture (Figure 2). We dissected this peritoneal tumor from small intestine mesentery carefully without tumor rupture. Then segmental resection of small intestine with en-bloc excision of the mesentery tumor was performed. Finally, primary anastomosis with hand-sew method was done after low anterior resection of colon, about 40 cm including rectosigmoid junction. Total blood loss was about 300 ml and the whole operation course was smooth. The specimen histopathology of the tumor resection showed well-differentiated liposarcoma with prominent myxoid stroma. This peritoneal was confirmed located on

mesentery of small intestine. No residual tumor was seen which means R0 resection was done. The other specimen of colon revealed adenocarcinoma, moderately differentiated. Postoperatively, after tolerating oral feeding, the patient was discharged on the tenth postoperative day. No surgical complication was detected.

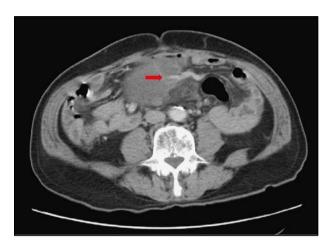


Figure 1: The tumor looks like originated from the mesentery of small intestine (arrow) and very near superior mesenteric artery/vein.

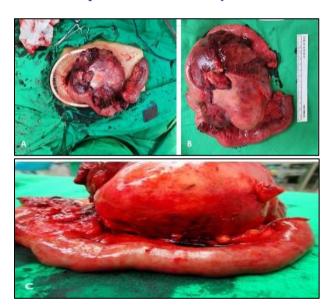


Figure 2: (A) The tumor has smooth surface with soft and pudding-like texture. (B), (C) The tumor originated from distal ileum's mesentery.

DISCUSSION

Among the different variants of liposarcoma, well-differentiated (low grade) liposarcomas are the most common, followed by dedifferentiated liposarcomas. Myxoid, round cell, and pleomorphic liposarcomas are less commonly found. Well-differentiated liposarcomas have no potential to metastasize; as such, they are referred to as atypical lipomatous tumors when they arise in the body wall/trunk or extremity.² Compared with well-

differentiated low-grade liposarcomas, dedifferentiated liposarcomas are high-grade tumors and they have higher local recurrence rates, the potential to metastasize (20 to 30 percent distant recurrence rate versus 0 percent for well-differentiated liposarcomas), and a sixfold higher risk of death.^{3,4}

In regard to soft tissue sarcoma, a complete surgical resection (R0/R1) at the time of initial presentation is the most important prognostic factor for survival. Sometimes, it is unresectable due to extensive vascular involvement or the presence of multiple peritoneal implants. Microscopically positive margins increase the risk for local recurrence and in some studies, patients who have an R1 resection have higher rates of distant recurrence and inferior survival as compared with those undergoing R0 resections. Therefore, adjuvant therapy including chemotherapy or radiotherapy should be considered in those cases with R1 and R2 resection.

CONCLUSION

Most of liposarcomas origin from the extremities, retroperitoneum and inguinal region. However, we have chance to find liposarcomas everywhere in our body. In our case, it was a liposarcoma derived from mesentery of small intestine and it had few reports before. These tumors may also present as cystic masses on imaging. Liposarcoma, or a term known as mesenteric lipodystrophy should be kept in mind as one of the differential diagnosis of mesenteric tumor.8 The key to treat these tumors is surgical excision with appropriate margins. Pre-operative chemotherapy has been reported to have been successful in shrinking a large mesenteric liposarcoma.9 If the tumor is too invasive to complete resection, neoadjuvent therapy may come in handy. In our case, final pathology report told R0 resection and no residual tumor was seen. Thus, we decided closely follow up instead of other adjuvant therapy.

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