



**RECURRENT DEDIFFERENTIATED LIPOSARCOMA IN A CASE OF MYXOID LIPOSARCOMA-A COMMON TUMOUR WITH A RARE PRESENTATION**

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**ABSTRACT**

Dedifferentiated Liposarcoma is one of the variants of liposarcoma which has a more aggressive course.It constitutes less than 10%of all the liposarcomas and is often found in the retroperitoneum and the mediastinum. We are reporting a rare case of a 45years old male who presented with a huge ,recurrent soft tissue mass in the left thigh since 6months with a past history of operation which was done twice after every six months duration.The histopathological examination showed features of Dedifferentiated Liposarcoma in known case of Liposarcoma.

**KEYWORDS :** Liposarcoma,Dedifferentiated Liposarcoma in thigh.

**INTRODUCTION -**

Liposarcoma is one of the most common soft tissue sarcomas of adult life.According to World Health Organisation (WHO),liposarcomas are generally classified into five subtypes-well differentiated, myxoid, dedifferentiated, pleomorphic,mixed.

The Dedifferentiated Liposarcoma refers to a condition in which well and poorly differentiated liposarcoma and nonlipomatous sarcoma coexist in one tumour.

The well differentiated and the dedifferentiated liposarcomas commonly occur in retroperitoneum,whereas the myxoid and pleomorphic liposarcomas typically present in the extremities(thigh).Men are more frequently affected than women.The tumour occurs most commonly in 5<sup>th</sup> to 7<sup>th</sup> decade of life.Surgical treatment and histology are the most important prognostic factors for patients with lipomatous tumour,as complete surgical excision reduces local recurrence rate.The dedifferentiated variant is known to be associated with a local recurrence rate of 41% to 52%,the metastatic rate of 15% and about 30%disease related mortality rate.We present a patient with a lipomatous tumour of the thigh along with diagnostic and therapeutic aspects.

**CASE REPORT-**

45years old male presented with chief complaint of a huge swelling in the left thigh since 6months.It was associated with pain and inability in taking up the routine daily activities.There was no history of trauma or any other illness.Firstly he was diagnosed as Myxoid Liposarcoma (19/7/2019)measuring 19x13x8cm,after 6months diagnosed as Dedifferentiated Liposarcoma (27/1/202020) measuring 10x9x5.5cm and finally after 6months was diagnosed as Dedifferentiated Liposarcoma (2/7/2020) measuring 30x20x5cm.Local examination revealed a huge mass measuring 30x20x5cm in the medial aspect of left thigh.The mass was nodular and soft to feel with some firm areas.Blood laboratory tests showed no changes from the normal range. MRI-shows a large lobulated solid cystic area measuring 24x15x5cm is seen in the subcutaneous plane over the medial aspect of the left upper thigh region.

FNAC-shows features suggestive of soft tissue sarcoma.On the basis of all the above findings ,a clinical diagnosis of liposarcoma was made and a wide excision of left thigh mass was carried out.The respected specimen was sent for histopathological examination.

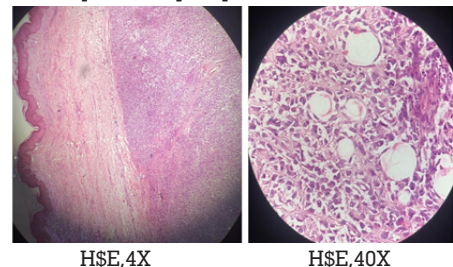


**Figure 1: Gross Examination**

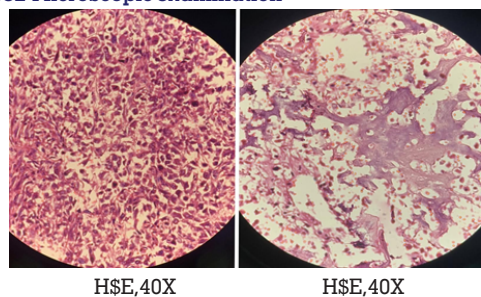
Specimen consists of a soft tissue mass measuring 30x20x5cm along with skin flap measuring 29x5.5cm with a linear scar measuring 29cm in length.

External surface-Bosselated.Larger nodule measuring 10.5x9x3cm and smaller nodule measuring 5.5x4x2cm.

Cut section-Varigated,firm areas identified.Multiple cystic areas along with large areas of haemorrhage and necrosis with nodules separated by fatty areas.



**Figure2-Microscopic examination**



**Figure2-Microscopic Examination**

Sections studied shows a ill circumscribed malignant tumour composed of tumour cells arranged predominantly in diffuse pattern .The individual tumour cells are separated by thick and thin fibrous septae and are highly pleomorphic with increased N:C ratio,oval to spindle shaped,vesicular to hyperchromatic nuclei with inconspicuous nucleoli and scant cytoplasm. Atypical spindle cells with blizzard nuclei are also seen. Rhabdoid morphology is seen.

Osteochondrosarcomatous differentiation seen.Large areas of necrosis,hemorrhage and dystrophic calcification is noted.Well differentiated lipomatous area is not seen.Stroma shows chronic inflammatory cell infiltrate composed of lymphocytes and plasma cells along with congested and dilated blood vessels.Mitosis is 3-5/hpf.

#### DISCUSSION-

Soft tissue sarcomas,which include liposarcoma and its subtypes,have a predilection to the musculoskeletal system,the retroperitoneum,and the trunk.Liposarcoma most commonly is found in the retroperitoneum and the lower extremities but also can occur in the upper extremities,head and neck region,thorax, abdomen,and pelvis at lower rates of incidence.Well differentiated liposarcoma constitutes 50% of liposarcoma and carries 5 years survival rate of 100%.Myxoid liposarcoma constitute 40% of liposarcoma and carries 88%of 5years survival rate.Dedifferentiated and pleomorphic liposarcoma are rare and carry 56% and 39% of 5years survival,respectively.The well differentiated liposarcomas grow slowly but dedifferentiated sarcomas grow faster and have a higher ability to metastasise than well differentiated liposarcoma.Dedifferentiated liposarcoma most commonly occurs within a well differentiated liposarcoma in the retroperitoneum and inguinal region,but it may rarely be encountered in the deep soft tissue of the extremities,as in our case.

#### CONCLUSIONS-

We are reporting a recurrent dedifferentiated liposarcoma of thigh which is a rare finding.The recurrence is high in this case because of the difficulty of obtaining negative surgical margins.The current standard therapy of Dedifferentiated liposarcoma is wide surgical excision.The widest resection possible should be achieved.Prognosis is favourable when the tumour is completely excised and there is no evidence of distant metastasis.

#### REFERENCES:

- [1] R Costea,E Vasiliu,NO Zarnescu,et al. (2011), "Large thigh liposarcoma : Diagnostic and therapeutic features." *Journal of Medicine and Life*,4(2):184-188.
- [2] Sankappa Pundalikappa Sinhasan, Basavanandaswamy Channaveerappa Harthimath, Mary Theresa Sylvia,et al(2016)," Dedifferentiated Liposarcoma of thigh :Tumour with monster cells." *Clinical Cancer Investigation Journal*,5(2):188-192.
- [3] Sunil V.Jagtap,Dhiraj B.Nikumbh,Swati S.Jagtap,et al. (2013), "Huge Dedifferentiated Liposarcoma of Left Thigh with a High Grade Fibrosarcomatous Differentiation and a Local Recurrence." *Journal Of Clinical \$ Dignostic Research*,7(3):553-556.
- [4] Richard S.Yoon,BS,Joseph Benevenia,et al. (2010), "Dedifferentiated liposarcoma of thigh with chondrosarcomatous dedifferentiated component" *The American Journal Of Orthopaedics(Belle Mead,N.J.)*, 39(11): E114-E118.
- [5] WHO-Tumours Of Soft Tissue And Bone.