doi:10.5368/aedj.2012.4.2.2.2

LIPOMA – A CASE REPORT

[1] Snehalatha R [1] Senior Lecturer
[2] Naveen Kumar R [2] Reader
[3] Vinuthna B [3] Senior Lecturer

[1]Department of Oral Pathology,SVS Institute of Dental Sciences. Mahboobnagar. Andhra Pradesh
[2]Department of Pedodontics,Navodaya Dental College and Hospital. Raichur. Karnataka,
[3]Department of Periodontics Navodaya Dental College and Hospital. Raichur. Karnataka.

ABSTRACT

Lipomas are benign mesenchymal neoplasms composed of mature adipocytes usually surrounded by a thin fibrous capsule. They are the most common soft tissue tumour , and about 20% of cases occur in the head and neck region. Lipomas occur with higher frequencies in areas like back, abdomen and shoulders of adults . In this study we describe a case of lipoma which was soft and mobile swelling , measuring 3cm x 5cm in size , and present on the right side of the occipital area of scalp which is considered to be a rare area of occurrence . The diagnosis is based on both clinical and histologic characteristics and the treatment is surgical exicision.

KEYWORDS: Lipoma , Histopathology , Occipital Region.

INTRODUCTION

Lipomas are most common benign neoplasms of adipose tissue. They are slow growing Asymptomatic masses. They make about 4-5% of all benign tumours of the body[1] They occur as a solitary, sessile , pedunculated or submerged lesions. The size usually ranges from a small lesion approximately 1cm in diameter to a massive tumour of 5 cm x 6cm in dimension. The colour, often is yellow and depends on thickness of the overlying skin. The surface is usually smooth and non - ulcerated except when traumatized.[2] Deeper lesions vary in contour and shape, they usually produce only a slight surface elevation which tend to be more diffuse than superficial type of lipoma. Etiology of lipomas remains unknown, although different theories like trauma and infection have been proposed. Microscopically it is not possible to distinguish the lipomas from normal adipose tissue but however the cells of lipoma differ metabolically from normal fat cells even though they are histologically similar probably due to high liporotein lipase activity in neoplastic tissue.[3] In this report we present the clinical and histological features of lipoma which was excised from the right side of the occipital area of scalp which is considered as a rare location for such a tumour to occur.

Case report

A 30 – year old man presented with chief complaint of swelling on the right side of head. He noted the swelling from past 3 months. Initially the swelling was small and gradually increased to the present size. Clinical examination revealed a soft swelling measuring 3cm x 5cm ,present on the right side of the occipital area of the scalp. On palpation it was mobile and non tender. No relevant medical and dental history was present. Family history revealed that other members in the family were normal. Considering all the above features a differential diagnosis of dermoid cyst , epidermoid cyst and lipoma was made. Laboratory tests revealed normal Hemogram and Biochemistry. An excisional biopsy was done and sent for histopathological investigations. We received , Formalin fixed single bit of tissue. On gross examination ,the tissue was measuring 5 x 3 cm in size, yellowish white in color, soft in consistency. Entire bit kept for processing. Microscopic examination revealed partially encapsulated tumor with numerous mature adipocytes arranged in the form of lobules separated by thin fibrous septa. There is evidence of mild vascularity and areas of hemorrhage. Skeletal muscle and nerve bundle are also evident in the deeper section.

Fig.1Swelling present on the right side of head.

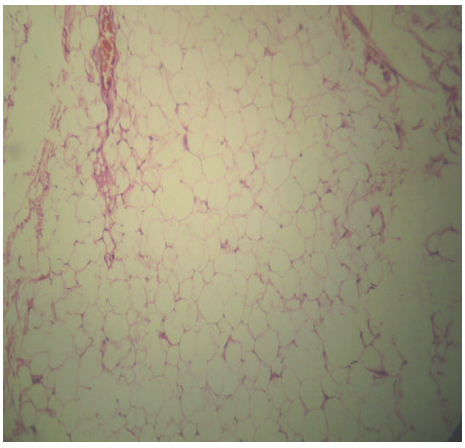

Fig.2 Section shows partially encapsulated tumor with numerous mature adipocytes arranged in the form of lobules separated by thin fibrous septa. – 4x. and 10x

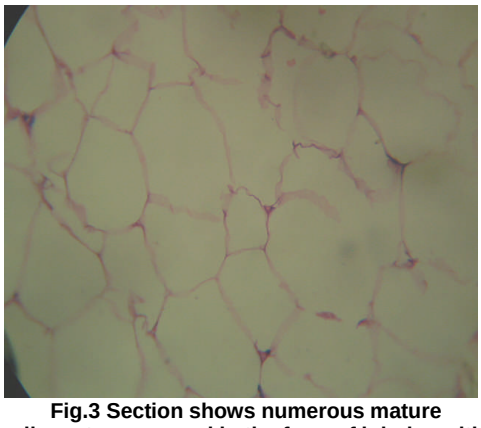

Fig.3 Section shows numerous mature adipocytes arranged in the form of lobules with peripherally placed nuclei - 40x

Discussion

Lipomas are fairly common tumours of head and neck region [1,4] which when untreated could result in aesthetic and functional deficits. The common age of occurrence was adult age group between 3-6 decades of life and male –female ratio was 1.4 :1. This case supports the current reports that lipomas are generally common in males than females [(5,6).] Typically lipomas present as solitary, painless, slow growing lesions, lobulated in appearance and attached by either a sessile or pedunculated base. This same clinical picture was present in our case too. The etiopathogenesis of lipomas is unknown, however history of trauma, infection, lipomatous differentiation of harmones during puberty and other factors have been considered as the etiological agents[7,8,9.] A differential diagnosis of dermoid cyst , epidermoid cyst and lipoma was made. Dermoid and epidermoid cyst was considered because these cysts also occur as submucosal nodules and lipoma was considered because clinically it was a soft swelling. The diagnosis of lipoma is usually made on clinical examination and histological evaluation of biopsy specimen. Various reports have shown that the role of fine needle aspiration , ultrasosnography , computerized tomography (CT) scan and magnetic resonance imaging (MRI) are of very little importance in diagnosing lipoma.[10,11.] Thus a clinician sending a surgical specimen for microscopic analysis must provide the oral pathologist with all available clinical and surgical information in making a definitive diagnosis.

Simple or conventional lipomas are the most frequent histologic subtype[12]. The other histological subtypes are

Fibrolipoma-	exhibit excessive fibrosis between the fat cells
Angiolipoma-	excess number of small vascular channels
Myxolipoma–	A myxoid background stroma
chondroid-lipoma/ossifying lipoma	Rarely , chondroid or osseous metaplasia may be seen

Association with systemic diseases is very less in lipomas but studies have shown that multiple site involvement is often present in persons with alcoholics ,diabetes mellitus and some syndromes like madelung's disease ,kobberling dunnigan syndrome[(13).] The treatment of lipomas is simple surgical excision with no recurrence rate[(5).]

CONCLUSION

Tumours of adipose tissue are common head and neck neoplasms. Lipomas should be considered in the

differential diagnosis of soft-tissue head and neck masses even in rare locations. Fine needle aspiration, ultra-sonography , computerized tomography (CT) scan and magnetic resonance imaging (MRI) are of very little importance in diagnosing lipoma. Thus histopathology plays a very important role in diagnosing a case when supplemented with proper clinical presentations.

References

1 Rapids AD. Lipoma of the oral cavity . Int J Oral Surgery 1982 ; 11:30-35. http://dx.doi.org/10.1016/S0300-9785(82)80045-8

2 wood nk , goaz pw , differential diagnosis of oral and maxillofacial regions . 5 edition st Louis mosby 1997.

3 Shafers Text book of oral pathology 6th edition

4 De Jong A.1,Park A, Taylor G, Forte V. Lipomas of the head and neck in children. Int J Pediatr Otorhino-laryngol. 1998; 43:53-60. http://dx.doi.org/10.1016/S0165-5876(97)00156-0

5 Fregnani ER, Pires FR, Falzoni R, Lopes MA, Vargas PA. Lipomas of the oral cavity: clinical findings, histological classification and proliferative activity of 46 cases. Int J Oral Maxillofac Surg. 2003;32(1):49-53. http://dx.doi.org/10.1054/ijom.2002.0317

6 Weiss sw , Goldblum enzinger, Lipomas of the oral cavity: clinical findings, histological classification and proliferative activity of 46 cases. Int J Oral Maxillofac Surg. 2003;32(1):49-53. http://dx.doi.org/10.1054/ijom.2002.0317

7 Sadyam L, Bozkurt MK, Ugur MB, Ozcelik T, Kutluay L (2005) Angiolipoma of neck : A case report Ear Nose Throat J 84, 575-377.

8 Enzinger FM , Weiss SW (1995) Benign lipomatous tumours In: Soft tissue tumours , 3rd ed.

9 El – Momen MH ABD, Ggaafar AH , Magdy EA (2006) Lipomas of the head and neck: presentation variability and dianostic work-up. J Laryngol Otol 129, 47-55.

10 Yasumot M. Shibuya H. Gomi N. Kasuga T. Ultrasonographic appearance of dermoid and epidermoid cysts in the head and neck . J Clin Ultrasound. 1991 ; 19:455-461. http://dx.doi.org/10.1002/jcu.1870190802

11 Ahuja A. T, King A.D,Kew J, King W, Metreweli C. Head and neck Lipomas : Sonographic appearance. *AJNR Am J Neuroradiol*1998 ; 19: 505 – 508

12 De Visscher J.G Lipomas and fibrolipomas of the oral cavity. J of oral and maxillofacial surg 1982.10 : 177-181.

13 Biasi D, Caramaschi P , Carletto A et al. Symmetric multiple lipomatosis with Charcots' joint and neuropathic ulcer : Description of a clinical case. Minerva Medica 1993 ; 84: 135 – 139.

Corresponding Author

Dr. Snehalatha R .
12-2-823/5, F-201, Surya residency,
santosh nagar , Mehdipatnam ,
Hyderabad , Andhra Pradesh.
Ph : +91- 9885411661
E-mail:drrsneha@gmai.com