

GÖĞÜS DUVARININ NADİR GÖRÜLEN TÜMÖRÜ; ELASTOFİBROMA DORSİ

A RARE TUMOR OF THE CHEST WALL: ELASTOFİBROMA DORSİ

Mustafa Kuzucuoğlu

Balıkesir Üniversitesi Tıp Fakültesi, Göğüs
Cerrahisi Ana Bilim Dalı, Balıkesir

Yazışma Adresi:

Mustafa Kuzucuoğlu
Balıkesir Üniversitesi Uygulama Ve Araştırma
Hastanesi Göğüs Cerrahisi Ad Çağış
Yerleşkesi Bigadiç Yolu 17. Km 10145
Balıkesir - Türkiye
E posta: mustafakuzucuoglu@hotmail.com

Kabul Tarihi: 07 Nisan 2017

doi: [10.5505/bsbd.2017.05925](https://doi.org/10.5505/bsbd.2017.05925)

Balıkesir Sağlık Bilimleri Dergisi

ISSN: 2146-9601

e-ISSN: 2147-2238

bsbd@balikesir.edu.tr

www.bau-sbdergisi.com

ÖZET

Elli iki yaşında kadın olgu sol skapula alt uçta kitle şişlik yakınması ile kliniğe başvurdu. Yapılan tetkiklerinde elastofibromadorsi saptanan olgunun kitlesi eksize edildi. Bu çalışmada nadir görülen elastofibroma dorsi patolojisi bir olgu ile sunulmuştur.

Anahtar Kelimeler: Elastofibroma, göğüs duvarı, benign tümör

SUMMARY

A fifty two years old female presented to the clinic presenting with a mass in the lower end of her left scapula. The mass proved to be elastofibroma dorsi and was excised. Due to its rarity, the pathology of elastofibroma dorsi has been presented with this case.

Keywords: Elastofibroma, chest wall, benign tumor

INTRODUCTION

Elastofibroma dorsi is a rarely encountered benign soft tissue tumor. It is non-encapsulated, slow growing, and classically located in the the infrascapular region. Due to its characteristic location, the tumor has been named elastofibroma dorsi. Although rare, the tumor can also develop in other parts of the body such as in the lateral chest wall, the axilla, the inguinal region, the stomach and the rectum, and in this case is referred to as elastofibroma^{1,2}.

In this study, we present a rare case of a 52 years old female patient with bilateral elastofibroma dorsi treated with surgery.

CASE

A fifty two years old female presented to our clinic with the complaints of swelling and pain in the lower end of her left scapula. She had been surgically treated for a swelling in her right scapula, which had been diagnosed as fibroelastoma one year ago in another medical center. In her anamnesis, she stated that in the period of past surgery, the lesion in the lower end of her left scapula had been determined by computed tomography (CT), but it was small and non-palpable. On her physical examination, a hard and fixed lesion was palpated in the lower end of her left scapula. Her thorax CT showed a mass lesion of 5x6 cm size, which was located on, but not invading the ribs with margins not clearly discerned (Fig.

1). The pre-diagnosis was elastofibroma dorsi, and the lesion, a mass of 8x6x1.5 cm, was surgically removed (Fig. 2). The histopathological examination result of the removed lesion was reported as "elastofibroma". The

case was controlled in the outpatient clinic in the 1st postoperative month, and upon no pathology having been found, follow-ups were planned.

Figure 1. Elastofibroma on the thorax computer tomography

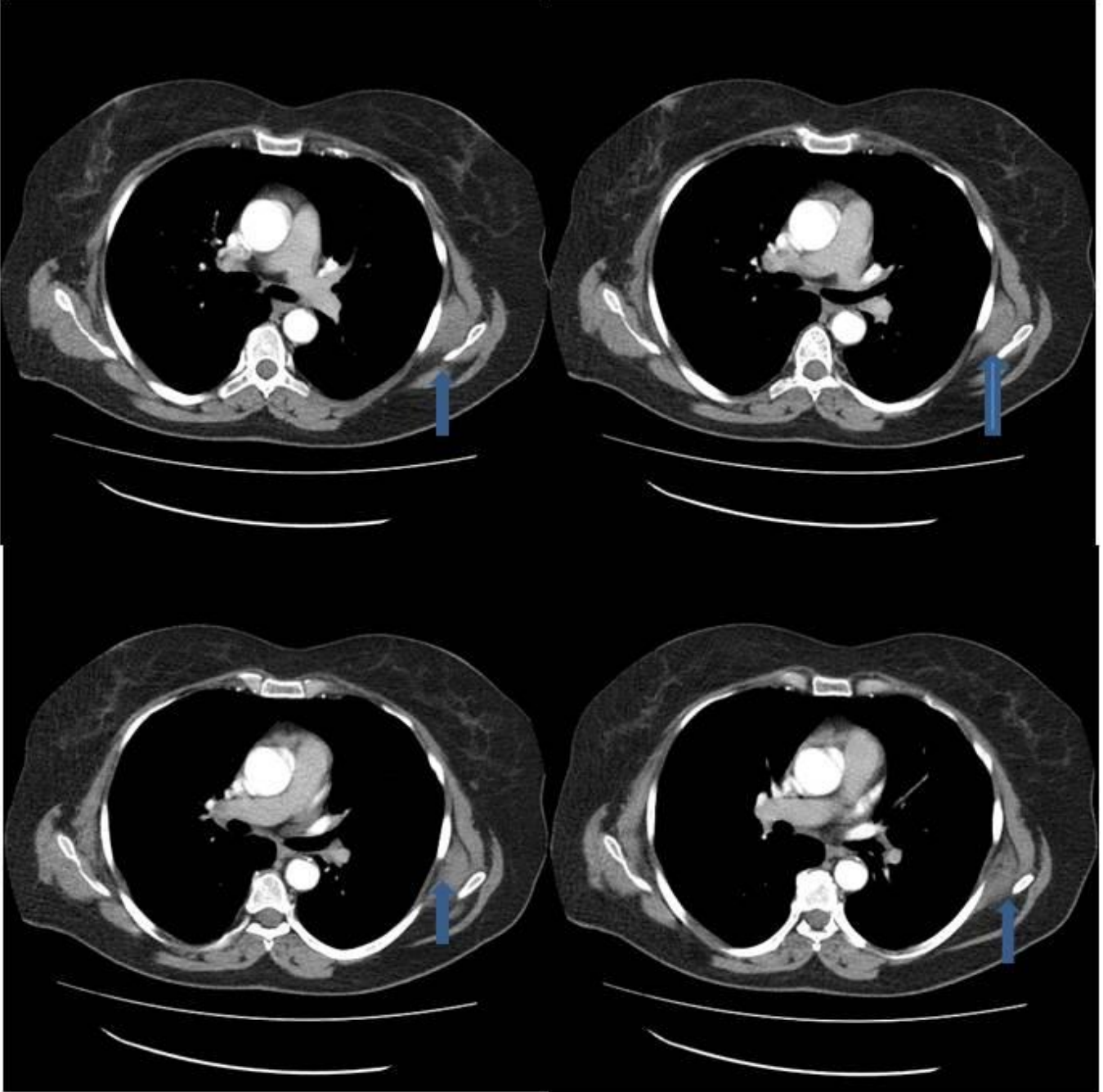


Figure 2. Operation specimen

DISCUSSION

Elastofibroma dorsi is one of the rare benign tumors of connective tissue. The tumor was first described by Jarvi and Saxen in 1961^{3,4}. The tumor is more prevalent in females aged over 50⁵. Brandser et al. ⁶ reported the tumor prevalence as 2% in individuals aged over 60, and as 24% in female autopsies and as 11% in male autopsies. Our case was a 52 years old female patient who had elastofibroma removed from under her right scapula one year ago and had the same kind of tumor removed from under the left scapula in our clinic.

There have been different opinions on the pathogenesis of elastofibroma. The first was the role of recurrent minor traumas due to friction of the lower end of scapula to the thoracic wall ⁷⁻⁹. The other views on the pathogenesis were reactive fibromatosis, degeneration due to vascular insufficiency, enzyme defects, and systemic involvement ^{1,7,10}. In their study on elastofibroma cases, McComb et al. ¹¹ found an increase in genetic instability in chromosome number 1 and translocation in chromosomes 8-12 and thereupon stated that the lesion could be of neoplastic origin with genetic predisposition.

Elastofibroma dorsi is unilateral in 90% and synchronously or asynchronously bilateral in 10% of the cases¹. Our case had asynchronously developed bilateral elastofibroma dorsi. The lesions are swellings that generally grow slowly, are asymptomatic, and push the scapula outwards. Shoulder movements may lead to increased pain and tension; shoulder movements may also be limited. During shoulder movements, a sound is heard as the scapula slides over the tumor mass ¹². In our

case, there was a fixed and painless swelling on the left scapula, and shoulder movements yielded a rattling noise.

Direct radiography, ultrasonography, CT, and magnetic resonance imaging (MRI) are used for the diagnosis. On direct radiographic examination, elevation of the scapula can be seen as a secondary finding. Ultrasonography shows the characteristic multilayered pattern of a hypoechoic linear areas. On the CT examination, the tumor mass typically appears as a poorly defined soft-tissue mass with attenuation similar to that of the adjacent skeletal muscle and holds linear low-density areas due to the presence of fat tissue. T1 and T2 weighted MRI scans characteristically demonstrate a soft tissue mass containing straight and curved linear areas of high or medium density ^{1,13}.

Elastofibroma dorsi is treated by total excision, but surgical intervention is not recommended for asymptomatic and masses smaller than 5 cm^{13,14}. Recurrence is rare, and malignant transformation has not been reported to date. In our case, total excision of the 8 cm size elastofibroma dorsi was performed, and the excising was performed so as to obtain negative surgical boundaries. No local recurrence was seen on the 3 month follow-up of the patient.

CONCLUSION

Elastofibroma dorsi is a rare and benign soft tissue tumor to be considered in patients aged over 50, especially in females, with shoulder and back pain. It is readily diagnosed by imaging techniques and totally cured by marginal surgical therapy.

KAYNAKLAR

1. Köksel O, Özdülger A, Özer C, Yıldırım Ç, Karabacak T. Elastofibroma dorsi: Olgu sunumu. *Türk Göğüs Kalp Damar Cer Derg.* 2005;13(3):279-82.
2. Tsutsumi A, Kawabata K, Taguchi K, Doi K. Elastofibroma of the greater omentum. *Acta Pathol Jpn.* 1985;35:233-41.
3. Kara M, Dikmen E, Kara SA, Atasoy P. Bilateral elastofibromadorsi: proper positioning for an accurate diagnosis. *Eur J Cardiothorac Surg.* 2002;22:839-41.
4. Jarvi OH, Saxen AE. Elastofibroma dorsi. *Acta Pathol Microbiol Scand.* 1961;51:83-84.
5. Javier A, Cavallasca, Debora I, Sohn, Ariel R, Borgia, María del Rosario Maliandi, Jorge L. Musuruanaa. Elastofibroma Dorsi: Review of 4 Cases. *Reumatol Clin.* 2012;8(6):358-60.
6. Brandser EA, Goree JC, El-Khoury GY. Elastofibroma dorsi: prevalence in an elderly patient population as revealed by CT. *AJR Am J Roentgenol.* 1998;171:977-80.
7. Yücel İ, Solak K, Arıcan M, Özturan KE. Bilateral elastofibroma dorsi. *Göztepe Tıp Dergisi.* 2012;27(2):80-5.

8. Greenberg JA, Lockwood RC. Elastofibroma dorsi. A case report and review of the literature. *Orthop Rev.* 1989;18:329-33.
9. Bennett KG, Organ CH Jr, Cook S, Pitha J. Bilateral elastofibroma dorsi. *Surgery.* 1988;103:605-7.
10. Guha AR, Raja RC, Devadoss VG. Elastofibroma dorsi-a case report and review of literature. *Int J Clin Pract.* 2004;58:218-20.
11. McComb EN, FeelyMG, NeffJR, Johansson SL, Nelson M, Bridge JA. Cytogenetic instability, predominantly involving chromosome 1, is characteristic of elastofibroma. *Cancer Genet Cytogenet.* 2001;126:68-72.
12. Daigeler A, Vogt PM, Busch K, Pennekamp W, Weyhe D, Lehnhardt M, et al. Elastofibroma dorsi-differential diagnosis in chest wall tumors. *World Journal of Surgical Oncology.* 2007;5(15):1-8.
13. Yenigün BM, Yıldız O, Yüksel C, Enön S, Kayı Cangır A, Kutlay H, Akal M, Kavukcu HŞ, Ökten İ. Elastofibroma Dorsi:11 Olgunun Analizi ve Literatürün GözdenGeçirilmesi. *Tuberk Toraks.* 2014;62(1):85-8.
14. Kourda J, Ayadi-Kaddour A, Merai S, Hantous S, Miled KB, Mezni FE. Bilateral elastofibroma dorsi. A case report and review of the literature. *Orthop Traumatol Surg Res.* 2009;95:383-7.