

CASE REPORT

Benign Histiocytofibroma Located in the Cervical Region : Diagnostic and Surgical Considerations Based on a Case Study

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Abstract

Benign cervical histiocytoma (HCF) is the most common fibrous tumour of the skin in adult women, and its causes are poorly understood. Nearly half of histiocytomas occur in the lower limbs. A positive diagnosis is based on histology, and treatment requires conventional surgery. However, the literature reports a negligible recurrence rate.

We report the case of a benign histiocytoma fibroma located in the neck of a 28-year-old patient with a history of pulmonary tuberculosis.

Keywords: Histiocytoma Fibroma, Neck, Adult, Brazzaville.

1. Introduction

Benign histiocytoma (HCF) is a benign tumour of unknown etiology. It occurs exclusively in adult females. Cervical localisation is often rare. Diagnosis is strongly suspected by computed tomography and confirmed by histology. However, treatment remains surgical, with a low recurrence rate [1].

2. Patient and Observation

Our work concerns Mr NT, aged 28, an electronics engineer by profession and Congolese, admitted to the ENT-CCF department of the Brazzaville University Hospital on 5 May 2025 for the management of a large right lateral cervical mass.

The patient's medical history includes a history of pulmonary tuberculosis in 2018, for which he was treated and declared cured.

The current symptoms date back to 2020, five years ago, marked by the appearance of a small

subcutaneous swelling on the right side of the neck corresponding to cervical lymphadenopathy; which gradually increased in size and was associated with intermittent fever and a productive cough, all in a context of good general health.

This clinical picture was linked to lymph node tuberculosis, for which the patient was placed on anti-tuberculosis medication for 06 months.

The response to this treatment was marked by persistent symptoms and an increase in the size of the lateral cervical swelling, which led to a consultation at the ENT-CCF department of the CHUB in May 2025. It should be noted that the patient was unable to consult in the meantime due to lack of financial means.

The examination in the department revealed slight weight loss with a large, locallyised right lateral cervical swelling, approximately 14 cm in length, which was sensitive, fixed in both planes, hard, with a bumpy surface and normal skin covering (Figure 1).

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Figure 1. Image showing a large, hard, rounded, well-defined mass on the right side of the neck

There was no evidence of cervical lymphadenopathy. The rest of the ENT examination and the examination of the other systems were unremarkable.

The cervical CT scan on 26 April 2025 revealed the

presence of a large tumour, appearing benign, well-defined, with regular contours, heavily calcified, and not enhanced after injection (Figure 2).



Figure 2. Cervical CT scan, axial view, showing a hyperechoic image corresponding to the calcified right lateral cervical mass

Histologically, the tumour presented as a benign mesenchymal cell proliferation with a storiform architecture and spindle-shaped cells without abnormal mitoses, corresponding to a benign cervical histiocytoma.

After a multidisciplinary team meeting (MDT), the tumour was deemed accessible for immediate surgery, which was performed after a complete and normal preoperative assessment.

The patient underwent a right lateral cervicotomy through a Hayes Martin incision. During the operation, a large, greyish-white tumour was discovered, which

was hard and friable in places, approximately 14 cm in length and slightly haemorrhagic. The vagus nerve and the right jugular-carotid vessels were visible and spared.

We then proceeded to total excision of the tumour (Figure 3) and closed the incision layer by layer up to the skin, leaving a drain in place.

The postoperative course was uneventful, with postoperative treatment consisting of antibiotics and analgesics as well as local care ; the patient was discharged on day 6 and complete healing was achieved on day 14 (Figure 4).

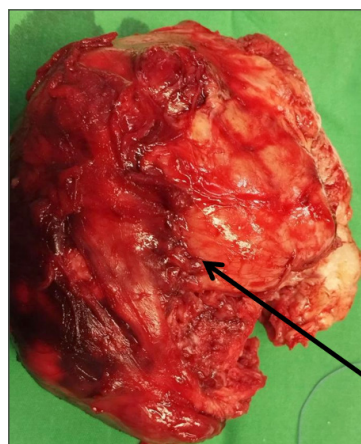


Figure 3. Image showing the extracted budding tumour (surgical specimen)



Figure 4. Image showing complete healing of the surgical wound (HAYES MARTIN incision)

3. Discussion

HCF is a subcutaneous fibrous tumour that develops in the skin of the extremities [1,2], is mostly benign and is generally found in adult females [3]. It was first described by STOUT and LATTES [4].

The most common location is the long bones, particularly the femur and tibia, and approximately 25% of the pelvic bones. However, the literature suggests that it can occur on any bone.

Many authors, notably BAILEY JS and BERTONI F [5,6], found that the age range at diagnosis was between 6 and 74 years, with a slight female predominance with a ratio of 1.4 [7].

Our medical observation concerned a 28-year-old male patient, contrary to the data in the literature.

Clinically, the tumour presents as a nodular formation that may gradually increase in size, bluish, brownish, achromic; firm, embedded in the dermis or adhering to the deep plane, sensitive with an exotic appearance; globular or polypoid and located in the lower limbs [8].

However, few studies have described the radiological characteristics of HCF [9].

In our case, the patient underwent a cervical CT scan, which strongly suggested HCF, which could be confused with either a cervical vagal schwannoma or a solitary tumour in a young adult.

Histologically, HCF is a benign bone lesion composed of fusiform dermal cells with a storiform architecture, elongated with a regular, achromatic, homogeneous nucleus, with a variable mixture of small giant cells and multinucleated cells on striated mitoses at 3/10, which corresponds to the histological results of our patient.

However, immunohistochemistry, which would allow for cellular tumour expression, was not performed on our patient due to insufficient technical facilities.

Surgical treatment, in particular complete tumour excision, is the only therapeutic modality for benign HCF [10,11], as was the case with our patient.

BRELAMOWICZ et al estimate a low recurrence rate of 11% in patients who have undergone total local excision of benign cervico-cephalic HCF.

4. Conclusion

HCF is a benign tumour that affects elderly women. However, cervical localisation is rare and a positive diagnosis requires histology. Nevertheless, surgery remains the treatment of choice and the prognosis is excellent, especially after complete excision.

Conflicts of Interest

The authors declare no conflicts of interest.

Authors' Contributions

All authors contributed to this work and declare that they have read and approved the final version.

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5. References

1. Bielałowicz S, Dauer MS, Chang B, Zimmerman MC (1995) Non-cutaneous benign fibrous histiocytoma of the head and neck. *Otolaryngol Head Neck Surg* 113(1):140-6
2. Azouz EM (1995) Benign fibrous histiocytoma of the proximal tibial epiphysis in a 12-year-old girl. *Skeletal Radiol* 24(5):375-8
3. Leona A. Doyle and Christopher D.M. Fletcher, 'Metastasising "Benign" Cutaneous Fibrous Histiocytoma,' *American Journal of Surgical Pathology*, vol. 37, no. 4, April 2013, pp. 484-495
4. Stout AP, Lattes R (1967) *Tumours of soft tissue : atlas of tumour pathology*. Armed Forces Institute of Pathology, Washington DC, pp 38-5
5. Bailey JS, Nikitakis NG, Lopes M, Ord RA (2001) Non-ossifying fibroma of mandible in a 6-year-old girl : a case report and review of the literature. *J Oral Maxillofac Surg* 59(7):815-818

6. Bertoni F, Calderoni P, Bacchini P, et al (1986) Benign fibrous histiocyoma of bone. *J Bone Joint Surg Am* 68(8):1225-1230
7. Dermatofibroma (<http://www.emedicine.com/article/topic1056742.html#>).
8. Khaddarkort R, Cherif F, Bouraoui S, Mokni M, Haouet S, Ben Osman Dhahri A. Basaloid hyperplasia on histiocytofibroma. *Ann Dermatol Venereol* 2004;131:105-106.
9. Onovo OD, Eyesan SU, Abdulkareem FB (2011) Benign fibrous histiocyoma of a metacarpal bone. *BMJ Case Rep* (pii:bcr0620103122. doi: 10.1136/bcr.06.20.10.3122)
10. Zizah S, Benabid M, Bennami A, et al (2010) A rare case of benign histiocytofibroma of the ankle. *Med Chir Pied* 26:113-116
11. Sanatkumar S, Rajagopalan N, Mallikarjunaswamy B, et al (2005) Benign fibrous histiocyoma of the distal radius with congenital dislocation of the radial head: a case report. *J Orthop Surg (Hong Kong)* 13:83-87.