An Uncommon Instance of An isolated Neurofibroma of The Ankle

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INTRODUCTION:

Neurofibromas are typically benign nerve sheath tumors linked to peripheral nerves and sometimes neurofibromatosis type 1. While uncommon in the foot and ankle, they account for less than 10% of such tumors and can cause pain and motor/sensory issues. Cutaneous types increase with age[1]. We describe a rare instance of a neurofibroma found in the ankle, initially thought to be a ganglion cyst.

REPORT:

A 35-year-old woman presented with a progressively enlarging lump on her left ankle, evolving over two years after a previous sprain. She reported no other symptoms or family history of neurological disorders. Examination revealed a soft, painless mass measuring 6cm x 6cm. Neurological assessment demonstrated normal function, without muscle weakness, sensory abnormalities, or reflex loss. MRI identified multiple well-defined lesions akin to a ganglion cyst. However, histopathological analysis indicated S100-positive spindle cells, confirming a neurofibroma diagnosis. Following excision biopsy and six months of monitoring, the patient remained symptom-free without recurrent swelling.

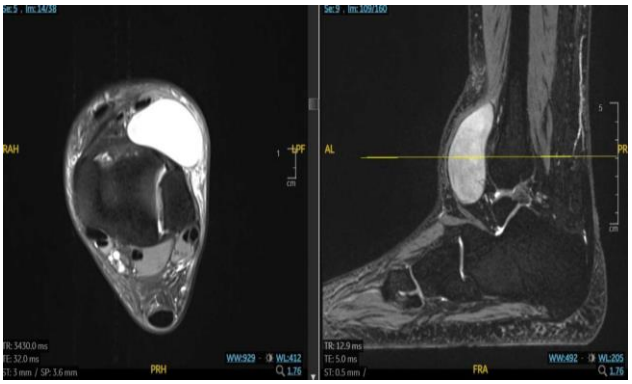

Figure 1: MRI showed well-defined lesions seen anterior to the tibiotalar joint.

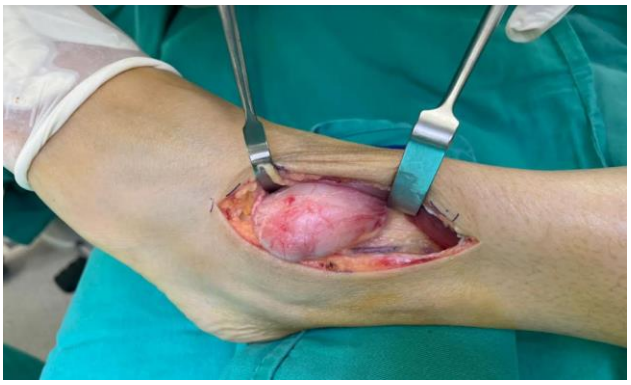

Figure 2: Intraoperative image of encapsulated and easily separable mass from nearby structures.

CONCLUSION:

Diffuse neurofibroma, a rare nerve tumor, exhibits distinct imaging features aligned with histological findings. It may relate to neurofibromatosis type 1 but can also arise independently[2]. Manifestations vary from benign skin nodules to potentially causing nerve compression or malignancy. Diagnosing this rare condition amidst unilateral ankle swelling necessitates meticulous history-taking and clinical examination. Distinguishing solitary benign neurofibromas from those tied to neurofibromatosis is crucial due to varying malignant transformation risks. In our case, the patient's presentation didn't meet neurofibromatosis criteria, excluding it from consideration. Accurate evaluation, incorporating imaging and detailed histopathological reports, is vital for proper management.

REFERENCES:

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