

EDİTÖRE MEKTUP/LETTER TO THE EDITOR

Solitary osteochondroma of pubic ramus

Pubik ramusta osteokondrom

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Dear Editor,

Osteochondroma is the most common benign tumor of the skeletal system, which accounts for 10-15% of all bone tumors and 20-50% of all the benign bone tumors¹.

It usually originates from the metaphyseal region and frequently seen within the first three decades. About 50% of these tumors are located in the lower extremities, although they may rarely be seen in the skull base, vertebral column, ribs, scapula and pelvis². Osteochondromas located in the pelvis, shoulders and hips have been reported to have higher risk of malignant transformation³. Herein, a patient with pelvic seated osteochondroma is presented.

A 17 year-old female patient presented to our clinic with complaints of pain and swelling on the right pubic ramus. In medical history, she reported occasional pain in that region and a gradually enlarging mass, but growth of the mass recently increased. She had not weight loss, fever or fatigue, and a known history of trauma.

On the physical examination, a hard, well contoured mass of 4x3x4 cm located anteromedially on the right pubic ramus was palpated. No rubor and color change was observed in the skin over the mass. There was no finding of swelling or mass in other parts of her body. Blood parameters of the patient were within normal ranges. X-ray demonstrated a bone mass on the right pubic ramus. (Figure 1a)

Magnetic resonance imaging suggested that the mass was an osteochondroma of 4x3x4 cm in size seated anteromedially on the right pubic ramus. (Figure 1b) Cartilage cap thickness of the mass was measured 8 mm and excision was planned.

Under general anesthesia with the patient in supine position, the tumor was exposed and totally excised with its root. On the macroscopic examination, the tumor was seen to be 3,5x3x2,5 cm in size, rough and well countured with a shiny surface (Figure 2). Cartilage cap thickness of the mass was measured as 8 mm. Pathological examination confirmed osteochondroma. No postoperative complication was observed and the patient was free of complaints after 1 year of follow up.

Osteochondromas are the most common benign tumors of the skeletal system. They are usually asymptomatic and identified incidentally2. The most common symptom related to osteochondromas is pain. In addition, depending on the location osteochondromas may cause nerve compression and restriction of the joint movements^{1,2}. Lower extremities are most commonly involved, while pelvic localization is infrequent. It has been reported in the literature that pelvic located osteochondromas may cause sciatic nerve compression^{4,5}, abdominal pain⁶, gluteal muscle atrophy, external iliac artery compression, haematuria⁷, bladder obstruction8, discomfort during sexual intercourse9 and pain due to malignant transformation¹⁰. Lesions in the pelvis and shoulder regions have a higher risk

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for malignancy. Rate of the malignant transformation has been reported less than 1% in solitary osteochondromas and 10-20% in hereditary multiple exostosis^{11.} The most important findings suggesting malignant transformation include pain (nerve compression, fractures), sudden rapid growth of the lesion and ongoing growth of the lesion despite skeletal maturity and expansion of lesions compared on previous radiographs¹¹. Cartilage cap thickness of >1 cm and dispersed calsification¹⁰ on CT and >2 cm on MRI⁹, soft tissue mass

development with or without calsification on radiography, CT and MRI^{11,12} have risk for malignant transformation.

In pelvic osteochondromas, diagnosis is delayed compared long to bones and accordingly, lesion sizes are greater. Pelvic involvement is more common with multiple osteochondromas and those carry a higher risk for malignant transformation. ¹² Therefore, surgical treatment of osteochondromas seated in the pelvis is preferable.

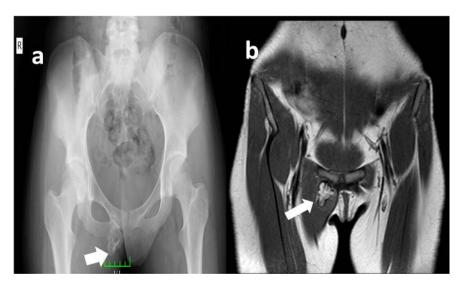


Figure 1a. The solitary osteochondroma of pubic ramus is seen on antero-posterior pelvis radiography. 1b. The solitary osteochondroma of pubic ramus is seen on T2 weighted MRI sequence.

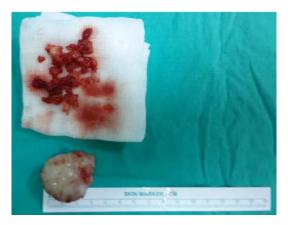


Figure 2. Intraoperative image of osteochondroma after excision.

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