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— Abstract —

**Periosteal chondroma of the proximal humerus  
- A case report -**

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Periosteal chondroma is a slow growing benign chondroid tumor. It erode the surface of cortex and induce a saucer shape defect. Histologically, it occasionally show hypercellularity, mitosis which can lead to the erroneous diagnosis of malignant tumor. Clinical, radiographic and pathological investigations are necessary to establish the diagnosis. Marginal excision proved an effective treatment.

To our knowledge, this benign chondroid tumor of humerus has never been previously reported in Korea. We report a case of periosteal chondroma of proximal humerus mimicking periosteal chondrosarcoma.

**Key Words:** Humerus, periosteal chondroma, periosteal chondrosarcoma

2,3,10) 가

7-9)

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**Fig. 1.** Plain radiograph revealing a fracture of upper part of the humerus with saucerization of the cortex and calcification in the cortical defect.

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(Fig. 1). MRI T1

(Fig. 2A), T2



**Fig. 2.** MR images (A) A T1 -weighted image shows a homogeneous periosteal and intramedullary lesion with intermediate signal intensity. (B) T2-weighted image shows the periosteal mass with high signal intensity and the intramedullary lesion as high signal intensity with intermediate and low signal intensity areas.

(Fig. 2B).

4 × 4 × 2 cm

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(Fig. 3).

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(Fig. 4).



**Fig. 4.** At 18 months after initial surgery, it show well healed previous lesion site, and no local recurrence of tumor.

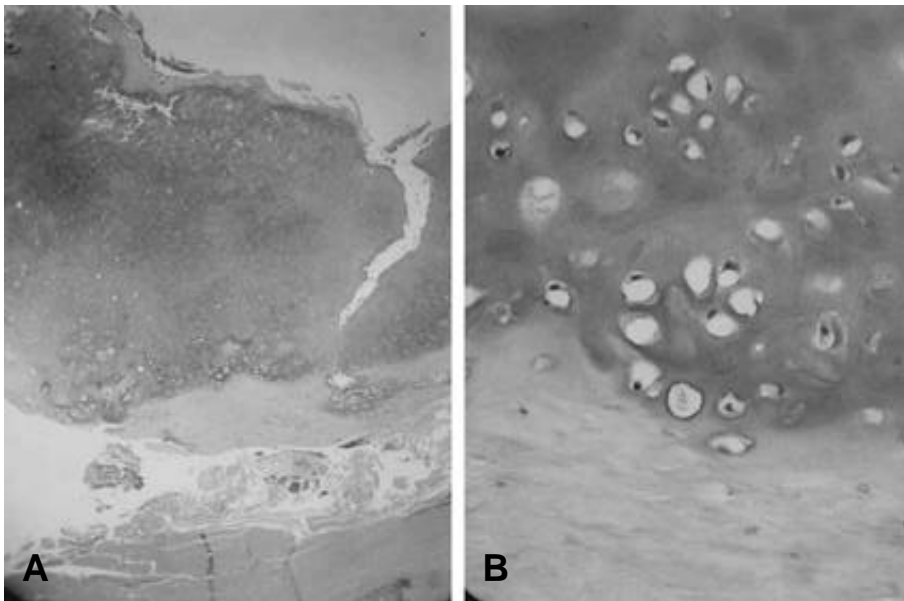
1952 Lichtenstein Hal<sup>9)</sup>

, 1920 McWorter Keiller

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, 1937 Robert

Eccentric chondroma, Mason Periosteal  
chondroma<sup>9)</sup>.



**Fig. 3.** Photomicrograph of the tumor (A) The cartilagenous tumor lobules are covered with fibrovascular tissue. (H&E stain, × 100) (B) The tumor is composed of mature hyaline cartilage. There is no cytologic atypia or mitosis. (H&E stain, × 400).

2,3,10)  
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 8) 10~20 가  
 1,6)  
 MRI T1 가  
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 1~3 cm 가  
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 6-8)

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