Turk J Phys Med Rehab 2021;67(1):125-126
DOI: 10.5606/tftrd.2021.5145
Available online at www.turkishjournalpmr.com

Letter to the Editor

Rectus femoris ossification accompanying with sacroiliac joint edema

Sibel Süzen Özbayrak, Büşra Çiğdem, Mustafa Hüseyin Temel, Duygu Geler Külcü

Department of Physical Medicine and Rehabilitation, University of Health Sciences, Haydarpaşa Numune Trainign and Research Hospital, Istanbul, Turkey

Received: August 16, 2019 **Accepted:** January 01, 2019 **Published online:** March 04, 2021

We would like to share our experience of a patient with rectus femoris ossification year after leaving football playing and presenting with inflammatory back pain due to sacroiliac joint edema.

A 51-year-old male patient presented with back pain while resting and awakening in morning without stiffness for 10 years. He also reported an insidious pain occasionally in the right hip during activity which he could not describe definitely. There was no chronic illness, history of trauma or physically hard working. Laboratory tests were unremarkable. Physical examination revealed just minimal pain during internal rotation of the hip. A plain radiograph of the pelvis showed a giant ossifying mass originating from the anterior inferior iliac spine (Figure 1) and magnetic resonance imaging (MRI) of the sacroiliac joint revealed bone marrow edema in the iliac side of the right sacroiliac joint. There were no signs of infections such as brucellosis and tuberculosis both clinically and in the laboratory tests. A detailed imaging of the hip with MRI and computed tomography (CT) revealed ruptured rectus femoris ossification. It was learned upon detailed questioning that he was playing football for 30 years in the past. After insufficient response to conservative treatment, the patient was consulted with the orthopedic surgeon.

Abnormal hypertrophy of the anterior inferior iliac spine, due to chronic traction strain from the direct (and reflected) head of rectus and, to a lesser degree, from the iliocapsularis muscle[1] is typically seen in sport medicine clinics in athletic individuals. It is one of the causes of subspine impingement. In this case, unique presentation of a patient with rectus femoris ossification years after leaving football is presented.

Abnormal motion in the lumbar spine, pubic symphysis, and hip can all lead to an increased stress at the SI joint and discomfort. Failure to recognize and address concomitant compensatory injury patterns associated with intra-articular hip pathology may result in significant disability and persistent symptoms in athletes with pre-arthritic, mechanical hip pain.[2]

Degenerative sacroiliac joint disease is markedly underrecognized condition that has remained largely

Figure 1. A plain radiograph showing rectus femoris ossification.

Corresponding author: Sibel Süzen Özbayrak, MD. SBÜ Haydarpaşa Numune Eğitim ve Araştırma Hastanesi, Fiziksel Tıp ve Rehabilitasyon Kliniği, 34668 Üsküdar, İstanbul, Türkiye. e-mail: sibels62@yahoo.com

Cite this article as:
Süzen Özbayrak S, Çiğdem B, Temel MH, Geler Külcü D. Rectus femoris ossification accompanying with sacroiliac joint edema. Turk J Phys Med Rehab 2021;67(1):125-126.

outside the research spotlight. This lack of attention can result in overdiagnosis of inflammatory sacroiliitis in patients with isolated sacroiliac joint edema. A significant number of patients meeting strict diagnostic criteria for sacroiliitis, including young patients, exhibit hip or spine conditions causing bone marrow edema of the sacroiliac joint.[2] In a recent study of 33 hips in 30 patients with radiographic evidence of degenerative sacroiliac joint disease, there was an excess of hip abnormalities (76%) including coxa profunda (52%) and/or cam femoroacetabular impingement (33%) and/or acetabular retroversion (21%).[3,4]

In conclusion, rectus femoris ossification is an extremely rare cause of hip pain in football players. It can cause high impaction loads at terminal ranges, resulting in compensatory effects on bony and soft tissue structures within the hip joint and hemipelvis such as in sacroiliac joint. Therefore, degenerative etiologies of sacroiliac joint bone marrow edema should be kept in mind to avoid unnecessary diagnostic tests and to provide an effective treatment.

Declaration of conflicting interests

The authors declared no conflicts of interest with respect to the authorship and/or publication of this article.

Funding

The authors received no financial support for the research and/or authorship of this article.

REFERENCES

1. Ross JR, Stone RM, Larson CM. Subspine impingement. Operative Techniques in Sports Medicine 2015;23:190-4.
2. Hammoud S, Bedi A, Voos JE, Mauro CS, Kelly BT. The recognition and evaluation of patterns of compensatory injury in patients with mechanical hip pain. Sports Health 2014;6:108-18.
3. Berthelot JM, le Goff B, Maugars Y, Laredo JD. Sacroiliac joint edema by MRI: Far more often mechanical than inflammatory? Joint Bone Spine 2016;83:3-5.
4. Morgan PM, Anderson AW, Swiontkowski MF. Symptomatic sacroiliac joint disease and radiographic evidence of femoroacetabular impingement. Hip Int 2013;23:212-7.