

IMAGES IN CLINICAL RADIOLOGY



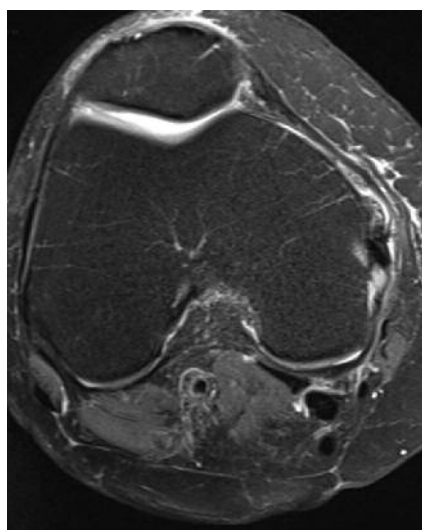
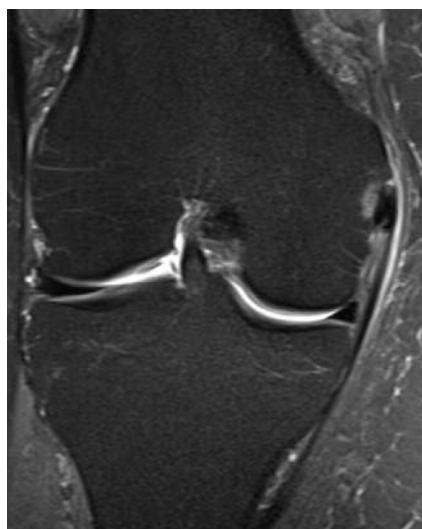
Pellegrini Stieda disease

J.B. De Vis, P. Kersemans¹

A 52-year-old woman presented with load-dependent pain on the right knee. Pressure pain was conceived at the medial femoral condyle and manual valgus stress as well as rotation provoked severe pain at the medial side of the knee. Plain radiographs showed an ossification at the proximal part of the medial collateral ligament (Fig. A). Further imaging occurred. Magnetic Resonance Imaging (MRI) showed the ossification as a signal void on T2-weighted images (Fig. B-C). There was also a hyper-intense signal surrounding the medial collateral ligament on T2-weighted images, consistent with an acute component. The diagnosis Pellegrini Stieda disease was made. Therapy consisted of rest and the use of non-steroidal anti-inflammatory drugs to treat the acute inflammatory component. No further follow-up of the patient occurred.

Comment

Pellegrini Stieda is a condition where ossification around the medial femoral condyle occurs. This may develop posttraumatically, different traumatic events having been described, eg. avulsion injury of the medial collateral ligament at the medial femoral condyle, tear or avulsion of the posterior cruciate ligament with stripping of the femoral periosteum proximal to the femoral attachment of the medial collateral ligament, ... Recent studies have shown that ossification has not necessarily to be in the medial collateral ligament. Ossification may occur as well in the medial collateral ligament, as in the adductor magnus tendon, or in both. Clinical symptoms are pain, limitation of motion, swelling and tenderness on pressure over the internal condyle of the femur. Diagnosis can be made by radiographic examination, which typically shows ossification at the proximal part of the medial collateral ligament. It is possible that early cases show abnormal 99 m technetium MDP uptake before evolution of plain radiographic changes. MR imaging shows ossification as a signal void on T2-weighted image, T1 shows a high signal intensity area within the fragment consistent with the fatty marrow of the fragment and an indication of its maturity. Therapy consists of exercises in combination with pain medication, with this, pain mostly disappears after a few months. In refractory cases infiltration with corticosteroids or surgery, to remove the calcifications, may be performed.



1. Department of Radiology, St. Elisabeth Hospital, Zottegem, Belgium.