the readers, but was statistically significant for 1 reader, with a 38% disparity between reads.

Using fat fraction of 6.1 as a cut-off for steatosis on MRS, sensitivity and specificity of ultrasound gradings were 71% and 100%, respectively.

The authors conclude that ultrasound is a good modality for assessing hepatic steatosis, particularly when the ultrasound demonstrates a normal liver or severe steatosis. Ultrasound has advantages of easier access and lack of restriction on patient size compared with MRS and is likely to remain a useful modality for assessing hepatic steatosis.

### Ultrasound Assessment of the Lateral Collateral Ligamentous Complex of the Elbow: Imaging Aspects in Cadavers and Normal Volunteers

Teixeira PAG, et al. *Eur Radiol*. 2011;21:1492–1498.

The objective of this study was to describe the ultrasound appearance of the lateral collateral ligamentous complex (LCL) of the elbow in cadavers and healthy volunteers. According to the authors, although ultrasound evaluation of the LCL has been reported in the literature, none has described in detail the individual components of the LCL or their attachment sites.

The LCL is an important lateral stabilizer, acting as the main restraint to posterolateral rotatory instability and is made up of the radial collateral ligament, lateral ulnar collateral ligament, and the annular ligament.

Ultrasound was performed on 10 cadaveric elbows and 10 elbows of healthy volunteers using linear high-frequency transducers. The 3 individual components of the LCL could be visualized in all but one of the elbows. In one cadaver, the proximal attachment of the LCL could not be visualized secondary to a calcification of the overlying extensor tendons. With respect to the annular ligament, its medial attachment on the sigmoid notch of the ulna could not be assessed, although its posterior attachment on the supinator crest of the ulna was visible. The body of the annular ligament was indistinguishable from the cartilage of the radial head. The radial collateral ligament and lateral ulnar collateral ligament could not be distinguished at their proximal origin.

The LCL could be distinguished from the overlying extensor tendon by a hyperechoic line, corresponding to a radiolucent line on radiography. A bony tubercle at the anterior lateral epicondyle, present in 61% of the cadaver and volunteer elbows, also demarcated the LCL and the extensor tendon origin.

Limitations of the study include the absence of clinical data on the cadavers and the age difference between the cadavers and volunteers.

### Imaging Findings Prevent Unnecessary Surgery in Vasitis: An Under-Reported Condition Mimicking Inguinal Hernia

Eddy K, et al. *Clin Radiol*. 2011;66:475–479.

This case report of 3 patients describes the imaging features of vasitis, also known as “funiculitis,” which is inflammation of the spermatic cord. Diagnosis of this entity can avoid unnecessary surgery, and ultrasound features are critical for the diagnosis. According to the authors, only 4 published reports of vasitis are available in the English literature, and no report has been published on its imaging findings.

All 3 patients presented to the emergency room with groin pain, and ultrasound was initially performed to exclude testicular torsion, epididymitis, and inguinal hernia. Instead, ultrasound showed a tubular structure corresponding to the spermatic cord with surrounding edema consistent with vasitis, and computed tomography examination in each case confirmed the absence of an inguinal hernia. All 3 patients recovered with antibiotic therapy.

The authors state that magnetic resonance imaging may be a more appropriate confirmatory test than computed tomography, especially if the patient is young. Vasitis is an uncommon but important cause of groin pain, and it may also be the source of symptoms in patients with sports hernia.

### A Comparison of the Accuracy of Ultrasound and Computed Tomography in Common Diagnoses Causing Acute Abdominal Pain

van Randen A, et al. *Eur Radiol*. 2011;21:1535–1545.

The purpose of this study was to compare ultrasound and computed tomography (CT) in the evaluation of patients presenting with acute abdominal pain in the emergency department and also to assess whether patient characteristics and radiologist experience impact the diagnostic performance of ultrasound. According to the authors, the diagnostic accuracy of ultrasound reported in the literature may be an overestimate, as published studies are often performed at institutions in which the radiologists are highly experienced in ultrasound.

Among 1021 patients, using surgery or 6-month follow-up as reference, ultrasound and CT had sensitivities of 76% and 94% for acute appendicitis, 61% and 81% for acute diverticulitis, and 37% and 67% for gynecological emergencies, and the differences were statistically significant. The sensitivities of the 2 modalities were not significantly different for diagnosing acute cholecystitis and bowel obstruction.

Positive predictive values of the 2 modalities for detecting acute appendicitis and acute diverticulitis were not statistically significantly different, although the positive predictive value for detecting inflammatory bowel disease was higher for CT compared with ultrasound.

Patient characteristics, including body mass index, and degree of radiologist experience did not have a statistically significant impact on the sensitivities of ultrasound. The authors conclude that ultrasound is a good first-line modality for evaluation of acute abdominal pain in the emergency department. They concede that sensitivities from the current study are lower than some reported in the literature,