

## **Elbow Injury-Football**

*Abbie Kelley DO, York Hospital Sports*

*Sponsor: Mark Lavallee MD*

**HISTORY:** 15 y.o. male football quarterback with complaint of right medial elbow pain after throwing a football at practice 5 days ago. Patient states that he heard a pop and was unable to throw the football after the injury. He denies any pain or previous injury to the elbow. Immediately following the injury, the patient describes a significant amount of pain and swelling. He treated the medial elbow with ice and compression, which did improve the swelling. He continues to complain of pain and inability to throw the football. He denies any numbness or tingling of the forearm, hand, or fingers.

**PHYSICAL EXAMINATION:** Inspection of right elbow reveals some fullness over the medial aspect. No ecchymosis noted. Tender to palpation over the medial epicondyle. Lacks 20 degrees of extension. Flexion is about 110 degrees. Strength in flexion and extension of the elbow is full, 5/5. Slight weakness with pronation of the hand. 5/5 strength in supination of the hand. 5/5 strength in wrist extension. Weakness in wrist flexion. Neurovascularly intact. No ulnar nerve subluxation. Negative ulnar nerve Tinel's test. Discomfort with valgus stress testing and milking maneuver, but no definitive laxity.

**DIFFERENTIAL DIAGNOSIS:** 1. Ulnar Collateral Ligament Sprain, 2. Ulnar Collateral Ligament Tear, 3. Medial Epicondyle Apophysitis, 4. Strain of the flexor-pronator mass 5. Elbow Dislocation 6. Ulnar Nerve Subluxation, 7. Medial Epicondylar apophyseal fracture

**TEST AND RESULTS:** X-ray of the right elbow reveals an avulsion fracture of the medial epicondylar apophysis.

**FINAL/WORKING DIAGNOSIS:** Avulsion Fracture of the medial epicondylar apophysis, Salter-Harris 1.

**TREATMENT AND OUTCOMES:** Patient was placed in a sling for 2 weeks and told to wean out of the sling, only to use for comfort thereafter. Tylenol was used for pain as needed. Pt followed up 1 month after the injury, at which time the patient was completely pain free and range of motion improved. Repeat x-ray of the right elbow showed healing of the medial epicondylar fracture. Sling was discontinued and patient was told to follow up in 1 month. He was instructed NOT to participate in any type of throwing sport for at least 3 months time. If, at that point, patient is still pain free, he will start physical therapy and gradual return to play/throw protocol.