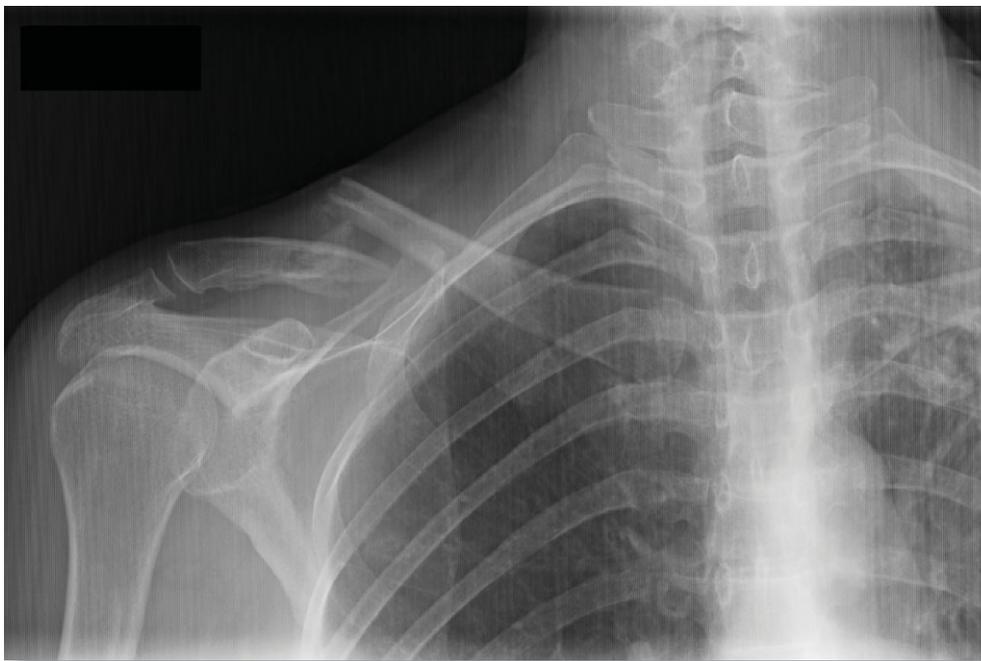


# RADIOLOGY QUIZ

By J. Michael Ray, MD, Ivette Guttman, MD,  
and Brian L. Patterson, MD

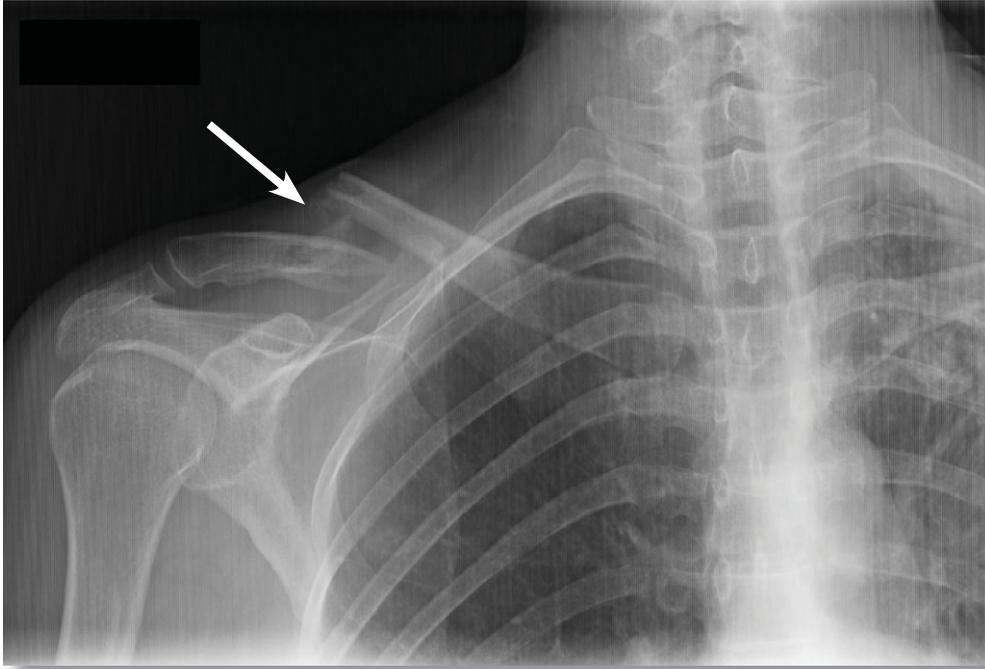
## PROBLEM



➤ A 47-year-old woman presents to your urgent care center three and a half weeks after falling on her right shoulder. The patient states that the discomfort from that trauma had been fading, but then three days ago she rolled over in bed and felt an intensely painful “pop” in her right shoulder. Now, she tells you, she is in extreme pain, especially when she attempts any activity that requires the shoulder’s full range of motion. Considering the patient’s history, how would you interpret this view of her shoulder?

Turn page for answer ➤

## ANSWER



➤ This radiograph reveals a fracture of the distal third of the right clavicle with displacement of the proximal fragment. Clavicle fractures usually result from a fall either onto an outstretched arm or directly onto the shoulder. About 15% of them are distal.<sup>1</sup> Treatment includes rest, ice, use of a sling or figure-of-eight bandage for five to six weeks, and analgesics. Figure-of-eight bandages maintain the shoulders in an upward, outward, and backward position to facilitate reduction of the clavicle. In cases such as this one, where there is significant displacement of the fracture, the patient should be fitted with a sling, given pain medication, and referred to an orthopedic surgeon for open reduction and internal fixation. Note that the distal fragment is nondisplaced representing intact acromioclavicular and coracoclavicular ligaments. If the integrity of these ligaments had been compromised by the injury, physical therapy would have been necessary to restore the patient's full range of motion.

### REFERENCE

1. Skinner H: *Current Diagnosis and Treatment in Orthopedics*. McGraw-Hill, 4th ed. 2006:211.

**Dr. Ray** is the medical director and **Dr. Guttman** is director of clinical services at the National Training Center Sports Medicine Institute and Urgent Care in Clermont, Florida. **Dr. Patterson**, editor of "Radiology Quiz," is board certified in family practice and spinal cord injury medicine and currently works for the National Training Center Sports Medicine Institute and Urgent Care.